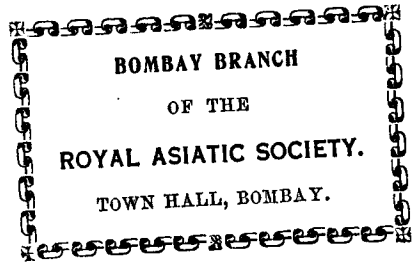
Vaccination throughout the Bombay Presidency and Sind

Reports for the years 1872-73 & 1875-76

00133476



Digitized with financial assistance from

Government of Maharashtra

on 01 February, 2020

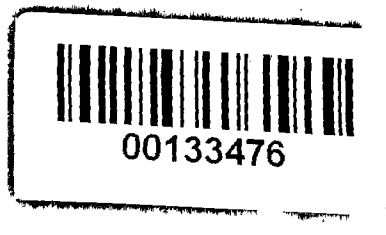
$\frac{11}{76}$
3

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SIND

FOR THE YEAR 1872-73.



13347C

Bombay:

PRINTED AT THE GOVERNMENT CENTRAL PRESS.

1873.

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SIND

FOR THE YEAR 1872-73.

This is the fifth annual report by the Superintendent General of Vaccination, Bombay Presidency.

Divisions of the Report.

2. As usual the report is divided into (*a*) a general statement of the working of the Department, (*b*) extracts from the reports of Circle Superintendents, (*c*) tabulated statements showing in detail the operations of the Department in each Circle and in the Bombay Army, and (*d*) summaries of the diaries of Circle Superintendents and Assistant Superintendents.

3. Whether as regards the number of operations performed, or the general working of the establishments throughout the year, the report I now submit must be a favourable one. That the vaccinators have worked well, and that the officers of the Department generally have zealously performed their duties, will, I think, be clear from the report and its accompaniments.

4. The following table shows the number of persons vaccinated during the past and the preceding year :—

1871-72.			1872-73.	
Primary Vaccinations.	Re-vaccinations	In Civil Life.	Primary Vaccinations.	Re-vaccinations.
507,729	18,673	Itinerant Establishment	546,841	15,035
13,792	523	Dispensary Establishment	16,685	1,266
521,521	19,196		563,526	16,301
540,717		Civil Life Total	579,827	
8,401		Army Total	8,530	
549,118		Total Vaccinations in Bombay Presidency.	588,357	

1 *vac*

Thus the returns of the past year show an increase of 39,239 persons over the preceding year. The increase is distributed as follows:—

Itinerant Establishment	35,474
Dispensary Establishment	3,636
Army do.	129
Total Increase ...	39,239

Number on Establishment.

5. Before pointing out the probable causes of this increase, it may be well to show the strength of the Vaccine Establishment in the past, and as compared with the preceding year. The following table shows this as existing on the 31st of March of each year, and, as will be seen, there has not been much change. The vaccinators have been increased by three, and one was transferred from the Imperial to the Local Funds Establishment in the Upper Sindh Frontier; this latter, being a mere transfer, did not affect the total number of vaccinators. Of the three added, two were appointed to the Upper Sindh Frontier District and one to the Kánadá Zilhá, and are paid from the Local Funds:—

Establishments.	1872-73.						1871-72.					
	Superintendent General.	Superintendents of Circles.	Assistant Superintendents.	Clerks.	Vaccinators.	Peons.	Superintendent General.	Superintendents of Circles.	Assistant Superintendents.	Clerks.	Vaccinators.	Peons.
Imperial	1	8	24	11	2	51	1	8	24	9	3	52
Local Fund	...	...	...	...	201	201	...	...	...	...	197	197
Municipal	...	...	...	...	51	43	...	...	...	...	51	43
Native States	...	2	3	1	119	111	...	2	3	1	119	110
Total.....	1	10	27	12	373	406	1	10	27	10	370	402

Causes of Increase.

6. That a very small portion of the increased number of persons vaccinated is due to the vaccinators added to the establishment will be apparent when I state that, of the total increase, only 1,729 persons were vaccinated by these men. The increase is, I think, due to the following causes. I give them in the order of importance:—

(*a*) To the vaccinators appointed on the reorganization, in the preceding year, having been employed throughout the year under report.

(*b*) To closer, more active, and more frequent supervision of the work of the vaccinators; the Superintendent having now an Assistant in each zilhá.

(*c*) To increase in the number of vaccinators.

Average operations per man.

7. The average number of persons operated on by each vaccinator exceeds that of the preceding year by 95. This appears to me to be a good test of the amount of work done; and, as I said in my last report, I think this, with the number of successful operations per man, is the best test of the efficient working of the Department. Regarding the latter I shall have more to say in detail hereafter. Suffice it to say, for the present, that the quality of the work has been as good as heretofore; and, taking into consideration the altered system of registration, the percentage of success met with, has been up to that of former years. The number of operations per man, for the past three years, is shown below, and, as will be seen, the past compares not unfavourably with the previous years, especially so when we consider the large number of young, and therefore less experienced, vaccinators employed since 1st August 1871—

1870-71	1,508
1871-72	1,411
1872-73	1,506

Expenditure.

8. The expenditure for the past exceeds that of the preceding year by 26,336: the total expenditure amounting to Rs. 2,10,795 against Rs. 1,84,459. This increase is due (1) to the establishment having been complete throughout the year, whereas in 1871-72 it was incomplete; the reorganization having taken effect from the 1st of August of that year; (2) to the whole of the postage having been debited to the Department; (3) to the entertainment of an Assistant Superintendent of Vaccination for the Kolhápur State and its dependencies; (4) to increase in the number of vaccinators and peons; (5) to the pay of the Aden and Sakkhar municipal vaccinators, included in this report, having been unavoidably omitted from the report of the previous year.

9. The following table shows the expenditure according to the sources from which it is derived, as well as the increase and decrease under each head. It shows an increase in all of them, but principally in Local Funds:—

Establishments.	Total Expenditure.	Compared with the preceding year.	
		Increase.	Decrease.
	Rs.	Rs.	
Imperial	99,881	4,185	.....
Local Fund	59,189	17,979	.....
Municipal	15,929	744	.....
Native Chiefs'	35,796	3,428	.....
Total ...	2,10,795	26,336	.....

10. The total *sanctioned* expenditure was Rs. 2,32,511. Of this Rs. 2,10,795 have been expended. The expenditure is, therefore, Rs. 21,716 *within* the sanctioned amount.

Average cost of each successful operation.

11. Taking the Presidency as a whole, but excluding the operations done at dispensaries, and by Army Medical Officers, for which no special expenditure is incurred, the average cost of each successful operation is annas 6—8 or 7 pies—equal to $\frac{7}{8}$ths of a penny—more than that of the preceding year. The average cost, according to establishments, is shown in the following figures, and these as compared with the previous year:—

	1871-72. As. p.	1872-73. As. p.
Local Fund	3 0	..... 3 3
Municipal.....	4 8	..... 5 10
Native States.....	3 7	..... 3 5

There has thus been a small decrease in cost in the Native States, and a small increase in Local Funds and Municipalities. Considering that the operations performed in the year 1871-72, by the municipal establishment, were nearly double the number performed in the year 1870-71, I am not surprised at the increased cost under this head; for I do not think it is possible always to maintain the high standard, in point of numbers, shown last year.

12. The remarks which follow, regarding sex, caste, and age, refer to primary vaccinations only: the particulars regarding these in re-vaccinations not being available. Of the total number of persons vaccinated 301,006 were

Sex.

males and 267,502 were females, or respectively 52·9 and 47·1 per cent. Compared with the preceding year this shows an increase of 1 per cent. in females.

13. In the matter of caste, except a small decrease in Musalmáns and a corresponding increase in Hindús, the percentage of each caste is almost the same as in the previous year. The number of Musalmáns per cent. vaccinated in Native States is only half that vaccinated in British Territory.

Caste.

14. In the report of last year I stated that, with a vaccinator, sometimes two, in each táluká, I anticipated, in a year or two, a gradual increase in the number of operations on infants, and I am happy to say that the returns of this year show a not inconsderable increase in this respect. The following shows the

Age.

number of operations on infants, under one year of age, for the past five years :—

1868	177,276
1869-70	175,596
1870-71	157,671
1871-72	174,522
1872-73	**198,484**

With the large extension of vaccination, during the past two years, the proportion of children under, to those above, one year has been somewhat disturbed—affected unfavourably. But this will soon right itself again, and the proportion per cent. under one year of age will soon increase. The percentage for the year under report is 36·8, or 2·3 per cent. over that of the preceding year.

15. During the past year measures were taken to bring this important matter prominently to the notice of Superintendents, their Assistants, the vaccinators, and the people. But these were taken too late to effect, very perceptibly, the returns of the year under report. I, however, anticipate a steady increase in the returns of future years. Hitherto, in some Circles at least, vaccinators have not sufficiently availed themselves of the birth registers as a means of assisting them to find the whereabouts of young children. Our great difficulty has always been, not so much the active opposition of the people, as their apathy, and the difficulty of ascertaining the whereabouts of unprotected children. Birth registers now, however, exist in every village, and this difficulty ought not to be experienced any longer. I have, therefore, directed that a vaccinator, before leaving a village, should invariably call over the name of every child entered in the register since his last visit, and, with the assistance of the village officers, to endeavour to persuade parents to have their children vaccinated. If this is strictly, judiciously, and zealously carried out, the result will, I think, be a large increase in the number of infants vaccinated.

Percentage of success in Primary Vaccination.

16. In former years, until the middle of 1871-72, the percentage of success was calculated on the result of the final operation on each individual. No matter how often the operation was performed, the result of the last operation only was recorded. Since the middle of 1871-72, however, agreeably to the orders of the Government of India, the result of every operation has been registered, and the consequence has been a large addition to the number of *unsuccessful* operations. The percentage of success is now therefore, calculated on the number of *operations* performed, instead of, as formerly, on the number of *persons* operated on. As a consequence of this alteration in the method of registration, the percentage of success appears a little lower than formerly; but the decrease is only apparent, not real. Registered according to the old method, the percentage would have been 95·8

or 1 per cent. more than the average for the past five years. Calculated by the new method, the percentage of success for the past year is 94·6 or 1 per cent. less than last year.

17. I have shown, I think satisfactorily, that the success attained in the past year has been quite up to that of former years. I may also add that I think the results recorded are more exact; accounted for by closer and more frequent inspection, ensuring better lymph and consequently better work.

81. It may be interesting here to record that 510,582 persons were primarily vaccinated with success, *i.e.*, 2·67 per cent. of the total population are reported to have received protection.

Percentage of Population vaccinated.

19. Having shown the general results of the year's operations, I now proceed to exhibit the results of the working according to Circles and establishments. The following shows the total number of persons vaccinated in each Circle, the increase and decrease as compared with the preceding year, and the percentage of the population operated on:—

	Total Number of Persons vaccinated.	Compared with the preceding year.		Percentage of the Population operated on.
		Increase.	Decrease.	
1. Central Circle... ...	1,18,387	7,410	.....	2·29
2. Southern do.	73,533	4,542	.....	1·60
3. Western do.	71,963	5,404	.....	2·67
4. Northern do.	93,738	10,292	.....	2·51
5. Sindh do.	78,314	.....	956	3·71
6. Káthiáwád do.	75,625	5,933	.....	4·19
7. Rewá Kántha do.	19,275	.....	671	2·76
8. Presidency do.	16,415	958	.....	2·25
9. Barodá do.	29,661	6,170	.....	.....
10. Kutch do.	2,232	.....	210	1·49
11. Aden Municipality ...	684	238	.....	3·54
Total ...	5,79,827	40,947	1,837	2·67
Deduct Decrease ...		1,837		
Total Increase* ...		39,110		

* Exclusive of the Army.

This table shows an increase in the number vaccinated in all Circles except those of Sindh, Rewá Kántha and Kutch. In these exceptions the decrease is small. Had Dr. Williams been in charge throughout the year I feel certain that, as far as the Sindh Circle is concerned, the result would have been otherwise. The supervision during the first half of the year was, I think, somewhat lax, and to this I attribute the decrease. The Northern Circle shows the largest increase, but it scarcely makes up for the very large decrease shown in the preceding year. Next in order comes the Central Circle, which has steadily progressed for several years, and close upon it follow the Barodá Káthiáwád, and Western Circles.

In the last column of the above table I have shown the percentage of the population vaccinated, and, as will be seen, in three of them, it exceeds the estimated number of births. In this respect the Káthiáwád returns are very high. No doubt this is due to arrears of work, but I do not see how such figures can be maintained for more than a few years. If the population is correctly given, and the proportion of births to population is the same as in Europe, there must be a decrease in the number vaccinated, two or three years hence, if not earlier, in the Sindh and Káthiáwád Circles. With regard to the percentages of the Central, Western, Northern, Rewá Kántha, and Presidency Circles, they appear to be slightly within the estimated number of births. So also with the Southern Circle. The latter Circle is behind all the others; why I am unable to say. But the fact remains. The number vaccinated is only half the number of births. I feel sure that there is nothing existing in the shape of extraordinary opposition or unusual indifference to vaccination, to prevent a larger amount of work being done, and during the past few months I have been endeavouring to effect a change in this respect. Some of the men, nearly one-half of them, I am sorry to say, are indolent, and will require the most watchful, intelligent, and strict supervision, to bring them into regular and active working order. I trust that Mr. Raby will effect something towards this end during the current year.

20. The highest Circle average number of operations per man is that of the Káthiáwád Circle, with 2,289 operations. The lowest, that of the Southern Circle, with 1,094 operations.

Percentage of success attained in Circles.

21. The average percentage of success attained in Circles and in Dispensaries is shown in the following table, and, if compared with that of the previous year, it will be seen that in a few of them the percentages are slightly lower, due entirely to the new method of registration noticed in para 16:—

			Primary Vaccination.		Re-vaccination.	
1.	Central	Circle	94·3	...	69·5	
2.	Southern	do.	91·6	...	59·9	
3.	Western	do.	94·0	...	66·8	
4.	Northern	do.	95·5	...	76·9	
5.	Sindh	do.	97 2	...	69·3	
6.	Káthiáwád	do.	96·0	Average...	71·6	Average 66·9
7.	Rewá Kántha	do.	96·9	94·6 ...	77·9	
8.	Presidency	do.	89·0	...	44·1	
9.	Barodá	do.	92·9	...	91·5	
10.	Kutch	do.	94·3	...	88·8	
11.	Aden	do.	71·6	...	...	
	Dispensaries	... ...	91·1	...	54·3	

22. For purposes of comparison it may be well here to add a table showing the percentage of success, as recorded by the vaccinators, *for primary and re-vaccinations combined,* and that ascertained from actual inspection by the Superintendent of each Circle. The following table shows this comparison omitting those Circles in which no inspection work is done by the Superintendents:—

Circle.	Percentage of success recorded by Vaccinators.	Percentage of success ascertained on actual inspection by Superintendents.
Central	91·1	93·9
Southern	95·2	73·7
Western	94·0	96·4
Northern	95·2	97·3
Sindh	97·8	98·1
Káthiáwád	95·0	92·1
Rewá Kántha	95·8	98·8
Total.....	95·0	94·7

The percentage of success given in the second column of this table, is the percentage of success recorded by the vaccinators for the children inspected by the Superintendents—not the percentage of success in the total vaccinated during the year—and includes all vaccinations, whether primary or secondary. It will be seen, in all, except the Southern and Káthiáwád Circles, the percentage of success, as ascertained from actual inspection by the Superintendents and their Assistants, is greater than that recorded by the vaccinators. This is accounted for by the calculation, in the former case, being made from

the number of persons vaccinated, and in the latter from the number of operations performed, *i.e.*, the former by the old and the latter by the new method explained in para 16. Why the percentage, as ascertained by the Superintendents, should have been lower in the Southern and Káthiáwád Circles, I am unable to explain. The difference is not great in case of Káthiáwád, but in the Southern Circle it amounts to 21·5 per cent. This shows a far from satisfactory state of affairs. An enquiry is being instituted into the matter. It may not improbably be due to want of correctness in the inspection reports of the Assistant Superintendents, two of whom were found unfit for appointment permanently, and were remanded to their former duties.

As far as the other Circles are concerned, they are, I think, satisfactory.

Local Fund Vaccination.

23. There is a very satisfactory increase under this head. As there are now only two vaccinators paid from the Imperial Funds, I shall, in consideration of the operations performed under this head, join these with those performed under Local Funds. The number vaccinated by these two men is 3,465, and that by the Local Funds Establishment 317,516=320,981, an increase over the preceding year of 10,969 persons. The following shows the increase and decrease in each Circle as compared with the preceding year:—

Increase.		Decrease.	
Central Circle	12,569	Southern Circle	269
Western do.	1,895	Sindh do.	1,325
Northern do.	2,454	Káthiáwád do.	2,723
	16,918	Rewá Kántha do.	1,632
Deduct Decrease...	5,949		5,949
Total Increase...	10,969		

The greatest increase in any Circle occurs in the Central Circle. It is more than equal to the total increase, and though due in part to the reorganized establishment having been maintained complete throughout the year, yet it must partly be ascribed to the careful, and intelligent supervision of Dr. Robb. The increase in the Western Circle is satisfactory, and is probably due to closer and more frequent inspection. The decrease in the Káthiáwád Circle is due, solely, to the removal of all the Government vaccinators, except one for Rájkot and neighbourhood, in the middle of 1871-72. That of the Sindh Circle I can account for only by the want of tact and care exercised by Dr. Keith in the first half of the year. Since Dr. Williams resumed charge in November much more work has been done. The decrease in the Rewá Kántha Circle, considering that there are only five vaccinators, is large. It is ascribed by Dr. Haliday to the great prevalence of "fever and dengue" amongst the vaccinators and the people generally.

24. The appointment of an itinerant vaccinator to each táluká was a grand improvement, and its influence will soon be felt, especially in the Deccan, where the establishment has always been particularly weak. The advantages of having a vaccinator permanently in each Táluká, or Rural Registration Circle, appear to me to be these—(*a*) villages are visited more frequently; (*b*) the vaccinator being always in one táluká becomes personally acquainted with the subordinate Government officials, the village officers, and the people; (*c*) in outbreaks of small-pox there is always a vaccinator on the spot to take immediate measures for stamping out the disease; (*d*) when vaccine lymph fails in one táluká, it is easily renewed by lymph from the neighbouring vaccinators.

Municipal Vaccination.

25. The number of vaccinators employed under municipalities, at the end of the year, was the same as at the end of the preceding year—one was abolished at Kotrí in Sindh Circle and one was appointed at Aden.

The number of persons vaccinated in the past year was 57,554 against 60,676 in the year preceding,—a decrease of 3,122. This cannot be considered unsatisfactory. On the contrary I think, considering the difficulties the men have to contend with (they being employed principally in large towns where vaccination generally proceeds less smoothly), and that the report of the year 1871-72 showed an increase of no less than 24,180 operations over the previous year, the work exhibited is very creditable to the establishment. That it is satisfactory when compared with the previous years will be seen from the following statement showing the average number of operations per man performed in the past five years:—

1868	764
1869-70	769
1870-71	715
1871-72	1,189
1872-73	1,129

26. In the following table the increase and decrease according to Circles is shown:—

Increase.		Decrease.	
Northern Circle	1,045	Central Circle	4,271
Sindh do.	252	Southern do.	391
Presidency do.	958	Western do.	953
Aden Municipality.....	238		
	2,493		5,615.
		Deduct Increase...	2,493
		Total Decrease...	3,122

The only decrease worthy of notice is that of the Central Circle, which is due to the abolition of the appointments in the tálukás of Mán, Khatáo and Koregám of the Sátárá Collectorate and of Sángolá in the Sholápur Zilhá. These abolitions, which were noticed in the report of last year, were carried out in the middle of 1871-72, and consequently the returns for the first half of the year were included in the statement of that year. Against these municipalities there is nothing shown in this year's statement.

27. Against these reductions there is a slight set off in the shape of a vaccinator appointed to some towns of the Juner Táluká, Púná Zilhá. The towns in question are Náráyangáon and Utur, towns in which the strongest opposition exists and always has existed to vaccination. In 1867, with the assistance of Mr. Claude Bell, C. S., in charge of the district, I made an endeavour to overcome this opposition, and we partially succeeded. But time appears to have blunted the people's sense of responsiblity in the matter, for they are reported to be as passively obstructive as ever. The man appointed performed 286 operations only; but what can be expected of a man who receives only Rs. 8 per mensem? To overcome the prejudices of the inhabitants of Náráyangáon and neighbourhood, the services of a man of considerable experience, energy, tact and perseverance are necessary. I need scarcely say that perfection is not likely to be obtained on Rs. 8 per mensem. The pay was fixed without reference to this Department.

28. The increases shown in the Northern and Presidency Circles are very satisfactory, but I find it difficult to assign the cause. In the latter case it is, perhaps, due to the prevalence of small-pox; no less than 1,637 persons having died from that disease during the past official year.

Hitherto the method of registering vaccine operations in the city of Bombay according to Registration Circles, as ordered by the Government of India, has not been carried out. I, therefore, directed the Local Superintendent of Vaccination to have this done for the year under report and future years. A reference to Statement No. I will show that this has been done, and that it is a great improvement in the old method of merely showing the total of the whole Circle.

Vaccination in Native States.

29. Vaccination has made very good progress in Native States during the past year. With the same number of vaccinators at work, the returns show an increase of 27,627 over the previous year. The following table shows the increase and decrease according to Circles. As will be seen, there is an increase in all the

Circles except two, *i.e.*, the Central and Sindh Circles, in which the decrease is very small indeed :—

Increase.			Decrease.	
Southern	Circle.....	3,056	Central Circle.....	553
Western	do.	3,703	Sindh do.	239
Northern	do.	5,480		
Káthiáwád	do.	8,845		792
Rewá Kántha	do.	939		
Baroda	do.	6,170		
Kutch	do.	226		
		28,419		
	Deduct Decrease	792		
	Total Increase...	27,627		

Considering that in 1871-72 the increase under this head was 16,730 and that the increase this year is 27,627—equal to 44,357 in two years—I think I am justified in reporting the results attained in Native States as very satisfactory. The Circle which shows the largest increase is that of Káthiáwád —the Circle in which the largest number of Native States' vaccinators are employed. In the returns of this Circle for last year, also, there was a large increase shown, but the returns of that year were clouded with a large number of false names. Those of this year compare very favourably in this respect. Dr. Butler resumed charge of the Circle in June last, and since then his knowledge of the men, of the language, and of the people, united with energy and tact, has had a considerable influence for good. Since he resumed charge, the insertion of false names has gradually died out, so much so that during the last four months of the year not a single false name was detected by Dr. Butler and his Assistants. Dr. Butler attributes this result to the discontinuance of the system of fining and dismissing men if their monthly returns, in point of numbers, did not reach the very high standard fixed by Dr. Blanc, and noticed unfavourably in para. 24 of my last year's report.

30. The Kutch Circle is superintended by the Medical Officer in charge of the Bhúj Dispensary. The operations carried on do not appear, to me, satisfactory. To what this is due it is difficult to say, but I think the establishment wants organization. Nine men performed 1,932 operations, or little more than the average number of operations performed by one man in British Territory. The annual average per man is 215, giving a monthly average of only 18 operations per man. I need not say that, with such a small number of operations, it is impossible that good work can be done

This state of matters appears to have continued for some years, and I think it would be well were Government to bring the matter to the notice of His Highness the Ráo. The total expenditure in the Kutch Circle during the past year has been 2,188 Rupees; of this Rs. 1,410 were paid from the Kutch State Treasury, and Rs. 778 by the Bháyáds. I would recommend that the whole of the money be collected in the State Treasury and formed into a Vaccine Fund, as was done last year in Káthiáwád, and that the number and pay of the establishment should be as follows:—

				Per annum.
1 Assistant Superintendent	on Rs.	50	per month =	Rs. 600
1 Vaccinator	on „	20	„ =	„ 240
1 Do.	on „	18	„ =	„ 216
3 Do.	on „	14	„ =	„ 504
6 Peons at Rs. 6 each =	„	36	„ =	„ 432
Contingencies at Rs. 2 each	„	12	„ =	„ 144
			Total Rupees per annum	2,136

This estimate is in Company's Rupees, and shows a saving of Rs. 52 per annum. If with this establishment, paid as above, the Circle was placed under the charge of the Superintendent of the Káthiáwád Circle, I think the number of operations would be, at least, trebled, and the work much better performed. At present the men are so badly paid, it cannot be expected that they should do much work. The highest pay is Rs. 12-10-0, the lowest Rs. 7-12-0 per month.

Vaccination in Janjírá.

31. In my last report I had pleasure in informing Government of the appointment of a vaccinator in the Janjírá State. I am happy to say that my anticipations, expressed in para. 24, have been fully realized. The man performed 1,364 operations without experiencing any unusual opposition or difficulty.

Vaccination in Jamkhandí, Miraj, and Sánglí.

32. In the Southern Circle some of the detached portions of Native States, such as Jamkhandí, Miraj, and Sánglí, being very imperfectly vaccinated, an endeavour was made during the past year to induce these Chiefs to entertain special vaccinators for outlying portions of their districts, and they have consented to the proposals. One vaccinator will be appointed to the Jamkhandí State for employment in the Kundegal Táluká, one to Miraj for service in Lakshameshwar, and a third to Sánglí for the Shrihattí Ilákhá. Much credit is due to these Chiefs for thus so liberally promoting the spread of vaccination.

Vaccination in the Bhor State.

33. The Bhor State is situated to the south-west and west of Púná, principally in the Deccan, but partly also in the Konkan, to the south of the Bhor Ghaut. It is

said to have an area of 1,044 square miles, and the population of 117,729. From its size, its population, the difficulty of travelling, its proximity to such a large city and cantonment as Púná, and the fact that inoculation is actively carried on in it, I am of opinion that at least two vaccinators are necessary. At present there is only one. During the past year an attempt was made to induce the authorities to entertain a second man, but without success. The Kárbhárí thought that, instead, the present vaccinator's pay might be increased, as an inducement to do more work, forgetting that one man, however well paid, cannot do the work of two. As was to be expected, there has been no increase in the number of operations performed. I shall again draw the attention of the authorities to this subject.

Dispensary Vaccinations.

34. Though the number of operations performed at dispensaries, by Dispensary Medical Officers, is in excess of the previous year by 3,636, and though at many of them fair progress has been made, yet I do not consider that, as a whole, the officers in charge have done as much as they might have. No doubt they have other duties to perform, but these are not more important than their vaccination duty, and the latter, if properly performed, need not much interfere with the former, an hour or two once a week being all that is required for that purpose.

It has always appeared to me strange that where an ordinary district vaccinator, a man generally of little education and small pay, has few difficulties to contend with, officers in charge of dispensaries—Sub-Assistant Surgeons as well as Hospital Assistants—month after month and year after year complain of ignorance, opposition, and apathy on the part of the people, and want of assistance by the village officers and subordinate revenue officials, and assign these as reasons for the small amount of work done. Where difficulties do exist, men like Sub-Assistant Surgeons and Hospital Assistants, by reason of their higher education, ought to be much more able to explain the benefits of vaccination to the people, and to overcome their prejudices than a common vaccinator. Yet the vaccinator operating the same number of days in the year will do quadruple the amount of work, and in a far more satisfactory manner, than the generality of these men. Where failure does appear, the causes of it seem, to me, to be these—(*a*) want of energy and zeal in the cause of vaccination: looking upon it as an extra duty and as a degrading occupation; (*b*) want of tact and patience, two faculties very much wanted in a vaccinator in this country, as all who know native character well will allow—that many of them have neither of these I have had frequent opportunities of witnessing; (*c*) inability to perform the operation neatly, quickly, and without unnecessary abstraction of blood. So very indifferent are many of them in this respect that I would not allow any of them to vaccinate a child of mine.

In many cases the operations are not performed by the Sub-Assistant Surgeon or Hospital Assistant himself, the duty being delegated to some raw apprentice or peon attached to the dispensary.

35. I am of opinion that every medical pupil and student for the appointment of Sub-Assistant Surgeon should, during the period of their attendance at the Grant Medical College, be required to attend the Byculla Vaccine Station, once weekly, for the purpose of being instructed by Mr. Anantá Chandrobá both in animal and human vaccination. Also that no one should be appointed to the medical charge of a dispensary until he has passed a satisfactory examination in the art of vaccination, or at least until he has procured a certificate of efficiency from the Vaccination Department. Were some such regulation enforced, we should hear less of bad vaccination at dispensaries, and of the inability of the officers in charge to vaccinate.

36. On examining the returns made by some of these men it will be seen how utterly impossible it is for them to keep up a supply of lymph. Seventeen of them performed on an average less than five operations monthly, about one primary vaccination per week ; and of the total of 105 dispensaries the returns of 25 only exceed the weekly average of five operations per man.

37. As vaccinators are held responsible for vaccination in their respective tálukás and towns, so I think should dispensary officers be held responsible for vaccination in the towns in which dispensaries are situated. They should have *entire* charge in towns in which a municipal vaccinator is not employed.

38. The increase in the number vaccinated at dispensaries is, I think, in a great measure due to Inspector General's Circular No. 1003 of the 21st March 1872, directing the officers in charge to fix vaccine stations in their respective towns, at places convenient for the people, and there to perform operations *personally* and with regularity, instead of dragging the people up to the dispensary, which in some cases is situated outside the town; but where there is a municipal vaccinator that should not relieve them of the responsibility of doing all they can to promote the spread of vaccination.

Vaccination in Goádar.

39. Vaccination has been carried on throughout the year by the apothecary in charge of the Goádar Agency, in Goádar and the neighbourhood, on the Mekrán Coast. In a population of 6,000 souls, 326 persons were vaccinated, with percentage of success of 82·9.

Vaccination in Bushire.

40. Lymph was furnished to Dr. Waters, the Civil Surgeon of Bushire, and vaccination was successfully introduced and carried on there. I am, however, unable to give the necessary details: no return having been received in this office.

Re-vaccination.

41. The returns of the past year, at first sight, show a considerable falling off in the number of persons re-vaccinated. This, however, I do not think, indicates any retrograde movement. It is, I think, due to greater correctness in the returns. Former incorrectness was mentioned by Dr. Pinkerton in para. 33 of his report for 1870-71, and the greater correctness of the returns of the past two years is due to the circular issued by him, and referred to in the above paragraph, as well as to the closer scrutiny to which the returns of the vaccinators and dispensary officers are now subjected.

42. In some Collectorates re-vaccination appears to make good progress; especially so in the Ratnágirí Collectorate, where 2,695 operations were performed. In the Ahmadábád and Khedá Collectorates, also, the number re-vaccinated has been large, and the number re-vaccinated at the dispensaries is more than double that of the preceding year.

Quality of Lymph.

43. All the Superintendents report the lymph having been kept in an active state throughout the year. As usual, in a case here and there it failed, but principally owing to the illness, dismissal, or death of the vaccinator, not to climatic causes. Vaccinators are, or should be, encouraged to report the deterioration or failure of lymph; and, unless when the failure is found, on investigation, to be due to carelessness, no one should be punished for it. Generally where failure did occur, the lymph was renewed at once, either by transmission of lymph in hermetically sealed tubes by post, or by the vaccinator procuring it from the neighbouring táluká. Formerly, when vaccinators were "far between," the latter method was difficult, but always the most satisfactory. Now, however, that each táluká has its vaccinator, no difficulty is, or need now be, experienced. As usual, large supplies have been sent to officers both in and beyond the limits of the Presidency, but, as a rule, no replies are received detailing the result of its use, unless when it happens to have failed and more is wanted. This, I think, is unfortunate, because valuable information might be accumulated regarding the best methods of transmitting lymph by post in this country.

English Lymph.

44. Two supplies only were received during the year—one in November 1872 and the other in January 1873—both from the National Vaccine Institution, London, through the Privy Council.

The following table gives the results of the use of each supply. As will be seen, the lymph did not prove very good—nothing like so good as the supplies of the previous year. The probable reason for this I am unable to

suggest. Nothing in its general appearance indicated that it was otherwise than good:—

Vaccine Institution from which received.	Vaccine Circle in which tested.	Number of				Summary of Remarks on the Vesicles by the Superintendents.	Remarks.
		Tubes tested.	Children operated on.	Punctures or scratches made.	Resulting Vesicles.		
National Vaccine Institution, London.	Central	5	7	28	22	Good... ...	Lymph received and tested in November.
	Southern ...	4	6	33	...	Unsuccessful .	
	Western... ...	3	2	12	...	Unsuccessful .	
	Northern	4	2	12	2	Unsuccessful .	
	Sindh	3	4	32	16	Indifferent ...	
	Káthiáwád ...	3	3	18	...	Unsuccessful .	
	Rewá Kánthá ...	3	3	18	4	Fair	
	Total.....	25	27	153	44		
National Vaccine Institution, London.	Central	5	10	41	21	Good ...	Lymph received and tested in January.
	Southern ...	4	5	28	1	Unsuccessful .	
	Western... ...	4	5	27	14	Very good ...	
	Northern ...	4	4	16	4	Good ...	
	Sind	4	2	16	7	Fair	
	Káthiáwád ...	4	4	24	10	Fair	
	Total.....	25	30	152	57		
	Grand Total.....	50	57	305	101		

The general results may be thus expressed: 305 punctures were made in he arms of 57 children with lymph from 50 tubes. Of the 57 cases perated on, 23 were absolute failures, and 34 presented 101 vesicles more or ess characteristic. Lymph propagated from this source was distributed to a arge number of vaccinators, and made use of during the year.

Animal Vaccination.

45. Animal vaccination has, during the year, been successfully practised at Bombay, Poona and Sakkhar; at the two former throughout the year and at Sakkhar for a short time in cold weather.

The people of Bombay are reported to take very kindly to cow-lymph, in a great many cases preferring it to that taken from the arm of the human subject. Out of a total number of 14,940 primary operations performed in Bombay, cow-lymph was used in 12,663, and of these 90·3 per cent. resulted successfully.

46. In the letter of the Inspector General, Indian Medical Department, forwarding my report for the year 1871-72 to Government, some doubts were thrown on the protective power of animal lymph, and Government in their Resolution thereon, para. 14, directed me to investigate, and submit a special report on the subject. That report has been submitted, and in it will be found all the information regarding the protective power of animal vaccination, as practised in Bombay, which as yet I have been able to collect. Meagre though that information be, it is yet entirely in favour of the protective power, purity, and trueness of the virus in use.

47. Out of 1,637 deaths from small-pox in the city of Bombay, during the past year, information as to the vaccination or otherwise of 679 is given by the Registrars. Of these 31, or 4·5 per cent., are reported to have been vaccinated, but at least two of these are doubtful cases. This cannot be said to be a high percentage, especially when it is considered that some, at least, had been unsuccessfully operated on, and, therefore, could not be considered protected by vaccination.

48. Seventeen medical practitioners, resident in Bombay, were asked, in writing, by Mr. Anantá, if they had ever seen or heard of an undoubtedly authentic case of small-pox after vaccination with animal lymph, and none of them could give the name of a single person. Mr. Anantá has paid great attention to this subject, and he has not the least doubt as to the protective power of cow-lymph.

49. Provided the origin and purity of the lymph in use is correct and good, I myself cannot see what doubt there can be in the matter, for the lymph styled animal and human are from the same source originally. The lymph in use in Bombay was introduced by Dr. Blanc, and its origin and purity are vouched for by him. I have seen the vesicles in a great many cases, both in Bombay and Púná, and I must say they were excellent; large, well-formed, unbilicated, and, on fair skins, of pearly appearance.

50. During the past year 241 calves were inoculated: 233 with the animal lymph in general use, and 8 with lymph received from M. Warlomont of Brussels. Of the former, 228 or 97·8 per cent., were successful; of the latter, 2 or 25 per cent., succeeded. This shows that the infective power of the lymph continues undiminished.

Inoculation of Small-pox.

51. That this very injurious practice is still carried on, is evident. Several cases were reported during the year. One of these occurred in Kelví Máhim, Thána Collectorate, and others in the Native States of Bhor and Dharmpur and in the province of Káthiáwád.

Inoculation in Kelví Máhim.

52. The case at Kelví Máhim was a very melancholy one, and one which, in my opinion, ought to be taken notice of by Government.

A dispensary has lately been started at Kelví Máhim, and in December last the Sub-Assistant Surgeon in charge, while in search of children for vaccination, discovered that a number of them had been inoculated. Among these were the children of the Pátil of Kelvi Mahim. Mr. Tribhuvandás Mohandás immediately brought the matter and the children to the notice of the Mámlatdár. That officer, however, took no notice of it, and did not ever report it to the Collector of the district. Immediately on its coming to my knowledge I addressed the Collector of Tháná, and requested him to investigate the case, and take what notice of the conduct of the Mámlatdár and Pátil might seem to him fit. In reply Mr. Walker Robertson informed me that, on representation of the Superintendent of Vaccination Western Circle, the matter had been enquired into, and he forwarded to me a copy of his letter to the address of the Revenue Commissioner Northern Division with the decision of that officer thereon. In the former Mr. Robertson says—"There is little, if any, hope that vaccination will become general, and be freely resorted to by the public, so long as the local authorities, in the place of Government, show a repugnance to its use, and are indifferent to its introduction, as evinced in the case of the Mámlatdár of Máhim. Conduct such as this deserves serious notice being taken thereof, and the undersigned can but express a hope that the Revenue Commissioner Northern Division will reduce him a step in the grade of Mámlatdárs. As to the Pátil he should, the undersigned considers, be prosecuted, under Section 337 of the Indian Penal Code, for aiding and abetting in the commission of an act likely to endanger human life and the personal safety of others."

The Revenue Commissioner, Northern Division, replied as follows:—"I have the honour to request that you will inform Azam Dinkar Trimbak, Mámlatdár of Máhim, that I am sorry to observe such ignorance in a man of his position. The success of the prosecution of the Pátil is doubtful. Opportunity should be taken to get rid of him, but when such example is set by the Mámlatdár, the Pátil can hardly be expected to hold very advanced ideas on the subject of vaccination. I have taken a note of the Mámlatdár's conduct."

53. In the concluding paragraph of his letter to my address the Collector says—"The task (the suppression of inoculation), though, is doubly so (difficult) when it is known that those who practise inoculation, and are the agents by which small-pox is but too often spread from place to place, cannot be prosecuted. The matter is one that imperatively calls, I think, for interference on the part of Government; for I cannot recognize that private individuals should be openly permitted by the State to disseminate a disease which Government is striving, at considerable expense, to stamp out or reduce as far as practicable."

54. It will be seen that the Pátil in this case, as I know frequently happens, gave active support to the inoculator, and actually had his own children vaccinated. Also that the Mámlatdár knowingly permitted the operations to be carried on. It appears to me that this is a matter which requires the immediate attention of Government. With a vaccinator in every táluká, and in many tálukás a municipal vaccinator as well in addition, there can be no objection to making the inoculation of small-pox matter a penal offence. That it is dangerous to life there can be no doubt, and that the men who practise it are aware of this is certain. That the prohibition of it would do good to the progress of vaccination, in some districts, is also certain; for, then, the people would learn that Government are desirous of putting a stop to it altogether. Whereas at presen tthey appear to think it is tolerated, if not approved.

Inoculation in Dharmpur.

55. In the beginning of the year the vaccinator employed by the Ráj á of Dharmpur reported to the Superintendent of Vaccination, Northern Circle, that inoculation was being carried on in the State. Dr. Colá at once brought the matter to the notice of the Darbár, through the Political Agent. In reply Mr. Shaw Stewart wrote as follows:—"The Dharmpur Ráj á has written to me to say that he has punished two persons who practised inoculation: one of these was caught by the vaccinator, and the other by the Foujadár. They have both been sentenced to one month's rigorous imprisonment, and to pay a fine of Rs. 25 or, in default, to suffer three months' further imprisonment! The Ráj á further says that he has made arrangements to look after such persons in future." The action, thus promptly and decisively taken, appears to deserve acknowledgment by Government.

Inoculation in Bhor State.

56. In the case of the inoculation in Bhor State I am unable to give the result of the action taken by the authorities. The State lies to the south-west and west, within a few miles, of the city and cantonment of Púná. To my knowledge inoculators are constantly at work in it, and I have little doubt that outbreaks of small-pox frequently originate therein.

Inoculation in Káthiáwád.

57. In Káthiáwád numerous cases of inoculation came to the notice of Dr. Butler, but most of them were over three years' standing. They were all on the border of the Gáikawád's territory, and in no case could Dr. Butler ascertain the name or residence of the inoculator. In one case the operations were said to have been performed by a woman. In all the site of the cicatrix was the styloid process of the radius.

Inoculation of other diseases.

58. During the year one case of supposed inoculation of another disease was reported as having occurred in the Kolábá Zilhá. I at once asked Mr. Cody to make a full investigation into it personally. He did so, and arrived at the conclusion that the child did not die from vaccination. The father made a statement to that effect before Mr. Cody and the Mámlatdár.

Small-pox.

59. Returns of deaths from small-pox for the months of January and March only have been received in this office. I am, therefore, unable to give statistics of the mortality from this disease during the past official year, except for the city of Bombay, the return for which was courteously furnished me by the Health Officer of that city.

From the reports of the Superintendents, small-pox appears to have been very general, but to have prevailed principally in the Frontier Districts, in the Collectorates of Ahmadábád, Khedá and Khándesh; the southern portion of Gujaráth appears to have escaped. Dr. Wyllie, Civil Surgeon of Ahmadábád, is of opinion that the disease was imported from Márwád. This seems to be most likely, and is in accordance with known facts. In Khándesh, also, the disease seems to have been imported; in this case from the Central Provinces where small-pox is said to have prevailed extensively.

Small-pox prevailed in other parts of the Presidency, but not in an epidemic, severe, or fatal form. Sindh appears to have been particularly free from its ravages.

Small-pox in Bombay.

60. During the past year 1,637 persons died in the city of Bombay from small-pox—one of the most preventible of diseases. That the great portion of these persons would now have been alive, had a compulsory vaccination Act been in force, no one, I think, will doubt. I say a great portion advisably, because it has been ascertained that many of those who died were not permanent inhabitants of the island, that they had only recently come to reside there, and in some cases had arrived in the incubitive stage of the disease.

In para. 46 I have given a few particulars as to the vaccination, or otherwise, of nearly one-half of those who died, so I need not repeat them here.

The following table shows the number of deaths from small-pox according to the months and the districts in which they occurred, as well as the number vaccinated in each district, during the past official year :—

Localities.	Deaths from Small-pox.													Number of Children vaccinated.
	April 1872.	May "	June "	July "	August "	September "	October "	November "	December "	January 1873.	February "	March "	Total.	
Kolábá	5	6	6	1	...	...	...	...	...	...	...	...	18	310
Fort, Southern ...	...	1	...	...	...	...	...	...	...	...	...	...	1	711
Fort, Northern ...	12	19	28	15	6	2	4	2	2	1	3	8	102	
Esplanade	1	1	...	...	...	...	...	...	...	...	...	...	2	937
Market	36	32	9	10	4	4	1	1	1	1	5	10	114	930
Mándví	54	22	13	4	...	2	2	...	...	5	4	9	115	428
Chakhlá	28	29	5	2	1	3	1	1	...	3	1	6	80	470
Umbarkhádí ...	30	20	9	9	1	1	1		..	3	8	16	98	1,076
Dongrí	21	15	9	8	...	...	1	...	1	2	4	11	72	890
Dhobí Taláo ...	17	37	53	21	6	....	1	2	1	2	5	12	157	1,118
Phanaswádí ...	4	6	4	...	1	...	1	2	1	2	7	6	34	382
Bhuleshwar ...	24	18	15	5	1	...	3	...	2	1	6	9	81	687
Khárá Taláo ...	28	18	8	4	3	1	...	...	1	2	5	14	84	680
Kumbhárwádá ...	24	14	5	2	1	1	...	...	...	2	5	4	58	387
Khetwádí	15	13	9	2	...	2	...	2	4	3	3	10	63	1,129
Girgáon	5	7	8	8	5	2	5	4	6	3	18	15	86	739
Chawapátí	3	1	2	1	...	1	...	1	5	3	4	2	23	169
Wálkeshwar ...	1	...	...	1	...	1	1	...	...	1	1	...	6	219
Mahálakshumi ...	2	3	3	...	...	1	...	...	...	1	...	...	10	414
Mázagáon	5	6	1	4	1	4	1	...	11	7	11	9	60	421
Tádwádí	6	8	3	3	...	1	1	...	...	1	...	1	24	208
Kámáthípurá ...	75	45	20	8	5	1	5	3	...	11	16	25	214	1,099
Parel	13	6	6	2	2	1	...	...	...	1	1	3	35	593
Shivrí	2	...	1	...	...	...	...	...	...	...	2	12	17	246
Seo	2	1	...	...	...	...	...	...	1	8	12	7	31	314
Máhim	6	5	2	2	...	...	...	...	...	2	2	2	21	599
Warlí	3	2	2	...	...	1	...	...	...	...	...	1	9	186
Water Division ...	1	...	...	...	...	...	...	...	...	...	1	...	2	17
Non-resident and Unknown	8	4	2	1	1	1	...	...	...	1	1	1	20	20
Byculla	...	...	...	...	...	...	...	...	...	...	...	...	...	694
Total.....	431	339	220	113	38	30	28	18	36	66	125	193	1,637	16,415

61. The following shows the number of deaths from small-pox in the city of Bombay during the past five years: two previous, and three subsequent, to the date of introduction of animal vaccination; and notwithstanding the severe epidemic which we have just passed through, it will be seen that the annual mortality from this disease has been less in the latter period :—

1868.....1,140 } Prior to the introduction of animal
1869.....1,725 } vaccination, annual average 1,432.

1870..... 556 } Subsequent to the introduction of
1871-72..... 1,213 } animal vaccination, annual average
1872-73..... 1,637 } 1,135.

Truthfulness of Vaccinators' Returns.

62. I think I may safely say that the returns of the past year will, in point of correctness, compare favourably with those of previous years. This is due to the closer and more frequent supervision to which the vaccinators know their work and registers are now subjected. But, in some places, there is still a good deal wanted to ensure correctness. In last year's report I advocated the introduction of a particular kind of village vaccination register, as a means of preventing falsification of records. I fear, however, that the method therein detailed cannot be carried out in some parts of the Presidency, especially in Sindh. In Sindh there is no village system such as we have in the Deccan and elsewhere. I feel, however, that something must be done in that province to ensure correctness of the returns, especially on the Frontiers. During my tour in Sindh, in the past year, I observed that the names of a large number of persons are shown in vaccinators' registers who were said to be inhabitants of foreign territory, or to belong to other villages or distant places in Sindh. These may be correct, every name; but that they are so we have no thoroughly reliable evidence. When the Superintendent or Assistant Superintendent come to make their inspections, such persons are always absent. And as the Pátil is almost invariably illiterate, I feel certain that neither he nor any one else, however intelligent he may be, can remember the names of the vaccinated strangers. This is especially the case in the larger towns. This subject has engaged and is engaging my attention.

Conduct of the Vaccinators.

63. During the year under report, the vaccinators, as a body, have conducted themselves and their duties satisfactorily.

In the Central Circle three men died, one was dismissed for falsification, one for absence without leave, one for continued inefficiency, and a fourth resigned.

In the Southern Circle one was dismissed for falsification, one absented himself, and one resigned.

In the Western Circle one was dismissed for continued inefficiency, one resigned, and one died.

In the Northern Circle one was pensioned, one died, and one was dismissed.

In the Sindh Circle two were dismissed for falsification of returns.

In the Káthiáwád Circle five men were dismissed—three by Dr. Blanc and one by Dr. Butler, for falsification, and the 5th by Dr. Sexton for absence without leave.

In Rewá Kánthá Circle one Native State vaccinator was dismissed for continued disobedience.

In Presidency Circle no casualties took place.

64. After an experience of a year and a half of the working of the Department since its reorganization by Dr. Pinkerton in 1871, it seems necessary to give some details as to the utility or otherwise of the newly-formed grade of Assistant Superintendent. Of 24 men originally appointed, 20 having, on the expiration of the probationary period, been pronounced "fit," were confirmed in their appointments, one is still on probation, and the remaining three remanded to their former duties. Of those so remanded one was employed in Sindh, and was noticed in para. 37 of last year's report. Tho other two belonged to the Southern Circle, and were much below the average vaccinator in intelligence. Of the 21 remaining, the Circle Superintendents report favourably of all, except one or two. Judging from the experience gained in my tours during the last two years, and from reports, special and otherwise, by Circle Superintendents, I think we have fair reason to be satisfied with the work performed by these men. It cannot be expected that men appointed to new situations, and to perform new duties, will become in such a short period thoroughly efficient; like all men they are fallible, and it would be strange were they to perform the duties imposed upon them without mistakes of some sort or other.

Assistant Superintendents.

These men have been found particularly useful in (*a*) their frequent visits to vaccinators, and the inspection of their work ensuring greater regularity and better lymph; (*b*) detecting falsification or incorrectness of registers, and thus ensuring greater exactness in the annual statements; (*c*) promoting the spread of knowledge of vaccination among the people and the subordinate Government officials, and instructing young vaccinators as to the manner in which they can, with best effect, conduct their duties and relations with the village officers and the people, especially where difficulties are met with and opposition encountered; (*d*) assisting dispensary Medical Officers in the same way; (*e*) stamping out outbreaks of small-pox: they can be on the spot at once, and with the assistance of the vaccinators of the neighbouring tálukás and the officers of the affected villages can operate emergently and with effect; (*f*) being constantly on the move the work of vaccinators is inspected at all seasons of the year, and as the vaccinators are never aware when it is to be inspected, they are obliged to pay greater attention to it and the preservation of the lymph.

65. The following is the summary of the special reports submitted to this Office, by Superintendents, regarding qualifications and usefulness of the Assistant Superintendents in their respective Circles.

In this Circle there are six men, and all of them, since their appointment, have performed their duties very satisfactorily, more especially the Assistant Superintendents of the Púná and Sátárá Zilhás. In the Sholápúr, Násik and Khándesh Collectorates, outbreaks of small-pox occurred, and were speedily extinguished by

Central Circle.

the prompt and effective measures taken by these men. All of them have been found useful in instructing the young vaccinators appointed, on the reorganization of the establishment, in August 1871, and in smoothing the way where difficulties were met with. They have also given effective aid in collecting and storing good lymph for transmission, by post, to vaccinators wherever required, and to a very large number of applicants, Medical Officers, and others, both within and beyond the Presidency.

Southern Circle.

There are four Assistant Superintendents in this Circle. Two of these were found unfit, and were remanded to their former duties. The other two are confirmed in their appointments. The Superintendent is of opinion that none of these men have sufficient education and intelligence for such appointments. He, however, considers that the two men who have been confirmed in their appointments have done their work fairly well. No instance in which they were found useful is given.

Western Circle.

There are three Assistants in the Western Circle. Of these two have performed their duties most willingly and satisfactorily, and in an active and intelligent manner. The third at first did not do well, but he is now improving. They have been found very useful in testing returns, ensuring a supply of good lymph, and in instructing the vaccinators. In a few instances irregularities, on the part of vaccinators, have been brought to light by them.

Northern Circle.

There are four Assistant Superintendents in this Circle. The Superintendent anticipated a great deal of good from these men, as inspectors of the vaccinator's work; but to a certain extent only have his anticipations been realized. The fact that they were selected from among the vaccinators does not, he thinks, inspire the vaccinators with a sufficient degree of respect for them, and consequently "their instructions are often disregarded, and good advice given at one visit is found at the next, not to have been attended to." Of these, however, such notice taken as will gradually enforce attention. In the early part of the current natural year small-pox was almost universal in the Khedá Zilhá, and called forth all the energies of the Assistant Superintendent. From actual personal observation Dr. Colá is able to say that, during the critical period, the Assistant Superintendent worked with praiseworthy zeal and industry, and was successful in stamping out the disease wherever he went. Had opportunities occurred, Dr. Colá is sure that the other Assistant Superintendents would have proved as useful as the Khedá Assistant Superintendent.

Sindh Circle.

There are four Assistant Superintendents in the Sindh Circle. Of instances in which these men are useful, Dr. Williams enumerates some of those mentioned in para. 64. But he reports rather unfavourably as to the activity and intelligence of two of them. The Assistant Superintendent of the Shikárpur Zilhá, who, last year, was reported on unfavourably, is this year held up as quite a model Assistant; active, intelligent, and possessed of great tact and judgment. He was successful in discovering and bringing to notice the absence, without leave, of two young vaccinators, in detecting very extensive falsifications, carried on for some time past, by the vaccinator of H. H. Mír Alí Murád. He is also reported to have stamped out an outbreak of small-pox in Sáidpur, to have pointed out that "a certain mír" was employing an inoculator, and, finally, to have fearlessly exposed every wrong doer. Of the other Assistants, the one employed in the Thar and Párkar District is reported to have done very good work, and to have improved and much extended vaccination in that Political Superintendency.

Káthiáwád Circle.

The report on the two men employed in this Circle is very favourable. Dr. Butler found them useful, particularly in the propagation of good lymph, in the verification of returns, in the teaching of vaccinators generally, and in the suppression of outbreaks of small-pox. At Wadwán and Lakhtar, where much difficulty was experienced, an Assistant was deputed to arrange matters. This was done with much tact, and to the entire satisfaction of Dr. Butler.

Rewá Kánthá Circle.

The Assistant Superintendent employed has not had any opportunity of prominently distinguishing himself, nothing unusual having occurred to call forth his latent energies. He has, however, done his work well.

Superintendents.

66. Changes among the Superintendents have been fewer than in the preceding year. Still they have been many. In the month of June Dr. Butler resumed charge of the Káthiáwád Circle, and has since remained in charge. Surgeon Lewis and Dr. Robb until the month of May were in charge, respectively, of the Central and Southern Circles. In that month they exchanged appointments. Dr. Williams resumed charge of the Sindh Circle from Dr. Keith in November. In the other Circles the Superintendents were in charge throughout the year.

67. Statement No. VII. shows the amount of attention which has been paid by Superintendents and their Assistants to each táluká and zilhá, as far as the travelling and inspection are concerned. The following table shows the total of each Circle as given in this Statement:—

Name of Superintendent.	Circle.	Number of Encampments.	Number of travelling days.	Distance travelled in miles.	Number of Villages visited.	Number of vaccinated Children inspected.
Mr. Lewis and Dr. Robb	Central ...	67	133	1,397	222	9,609
Dr. Robb and Mr. Lewis	Southern ...	68	111	1,295	151	4,933
Mr. Cody	Western ...	67	112	1,400	193	5,752
Dr. Mancharjí	Northern ...	54	166	2,050	414	13,640
Drs. Keith and Williams	Sindh... ...	143	271	2,770	635	13,890
Drs. Blanc and Butler	Káthiáwád ...	75	148	1,828	309	23,736
Mr. Haliday...	Rewá Kanthá...	31	121	921	215	6,799
	Total ...	505	1,062	11,661	2,139	78,359

I do not think, however, that this table shows at all well, nor is it possible to show, the amount of real work performed. As far as the first two columns are concerned, no doubt they do so, but not the others. For instance, the facilities for travelling vary much—by rail, by boat, &c.—as well as the nature of the country travelled over. Then, again, in the matter of villages visited, it is, strange to say, a very erroneous guide. In Sindh, for instance, every collection of two or three houses is considered a village, and entered as such in the returns; whereas in the Konkan and Deccan a village consists of the village proper, or "Mouje" as it is called, and of a number of "Wádís" or hamlets, in some cases a mile or two miles from the village proper, and sometimes as large as the town or village itself. In fact, no matter how many different collections of houses there may be on the land belonging to a particular village, or how far apart these may be, the whole is considered as one village only. In some cases there are as many as six or eight, and even ten or more of these "Wádís," some of them as big as the village town itself. If these were shown separately as in Sindh, the number of villages shown in the statements of the Superintendents of the Central, Southern, and Western Circles, at least, would be more than double the number shown in the present return. Again in the matter of children inspected, there is also a great variety. In the returns of some Superintendents, as for instance those of Messrs. Cody and Colá, the greater number of the children's names were read over, and the registers tested, column by column and name by name; whereas in some Circles the work is tested principally by examining the arms, one by one, of the children present merely. Hitherto inspections have thus been done in two ways, as time permitted or circumstances allowed, viz. (*a*) by reading over the names of the children from the vaccinator's register and testing it column by column; (*b*) by arranging the children in a row, examining their arms, and counting

them. The latter can only give a very general idea of the state of vaccination in a village, and is of little or no value as a test of the correctness of the vaccinator's register. However in this way a large number of villages can be visited, and children seen, with much less trouble and exposure to weather. For comparison with the table above given I show below the number of names tested by each Superintendent by reading over the names :—

Circle.	Work tested by calling Names from Register.							
	Present during Inspection.		Absent during Inspection.		Number of persons whom the Vaccinator has returned as vaccinated.			
	Successful.	Unsuccessful including doubtful.	Absence accounted for.	Absence unaccounted for.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.
Central	3,849	247	1,872	5	5,069	121	166	5,726
Southern	2,391	849	2,829	15	5,425	269	390	6,084
Western	5,004	182	1,845	15	6,456	406	106	6,968
Northern	11,690	324	3,369	...	13,956	699	667	15,322
Sindh	6,243	117	1,069	...	7,199	161	76	7,436
Káthiáwád	5,889	499	1,477	31	7,338	384	174	7,896
Rewá Kánthá... ...	5,938	71	2,522	...	8,007	349	175	8,531
Total	41,004	2,289	14,983	66	53,450	2,389	1,754	57,963

Generally the Superintendents have performed their duties with zeal and ability. The names of Drs. Butler, Cody, Colá and Robb deserve special mention. Dr. Williams since his return from leave to England has carried on his duties with his former energy, ability and success.

Assistance from the Civil Authorities.

68. It is gratifying to report that the Revenue and Political Officers have, generally, given much assistance to the Officers of this Department, and that they are taking increased interest in its operations. This is especially the case with the work carried on by the Local Fund vaccinators; Collectors and their Assistants and subordinates being now more directly interested in the work. There is one subject, however, on which more enlightenment is desirable. I refer to the idea prevailing in some quarters, that each

vaccinator should visit every village in the táluká within the year, and this without reference to the number of villages, and the area of the district in his charge. In my opinion it is impossible to lay down arbitrary rules of this nature without injuriously affecting the quality of the work performed. Many things—such as the willingness or otherwise of the people to submit their children for vaccination, the facilities for the conveyance of vaccine lymph, the nature of the country to be travelled over, assistance or otherwise rendered by the village officers and many others—have to be taken into consideration. During the year two of the Assistant Collectors of the Násik Zilhá reported to Government that vaccinators of the districts in their charge did not visit all the villages within the year, and this was submitted to me for report. One of the tálukás particularized was that of Báglán, a táluká consisting of two "pethás," besides the táluká proper, and having an area of 2,620 square miles and a population of 96,084 souls. Besides, the greater part of the táluká is hilly and difficult to travel over. Were it possible, I do not think it desirable, that the vaccinator should go over the whole in one year; for to enable him to do so he would have to dispense with arm-to-arm vaccination, and large numbers would have to be left unvaccinated in every village. Moreover, I do not think it is desirable much to increase the number of vaccinators. In some places there are rather more than sufficient already, I fear. In the present state of the country and of the Depa rtment, all that should be done is to urge vaccinators to perform as much work and overtake as many villages as possible. A vaccinator should never leave a village without making endeavours to persuade every one of the inhabitants to get their children vaccinated. To do this a great deal of time and patience are necessary, but the gain is great. The more complete the vaccination of individual villages is carried out, the more efficient will be the operations of the Department, and there will be less chance of small-pox gaining a footing therein.

Tour.

69. During the year I visited every Circle in the Presidency. In the month of May, during the "Rains," and in October, I had opportunities of frequently seeing the Superintendent of the Central Circle and his office. In November, after attending the Darbár of His Lordship the Governor General, in Bombay, I proceeded to Káthiáwád viâ Broach and Gogo. I travelled through the Gogo Táluká of the Ahmadábád Collectorate and the Bháwanagar State, viâ Bháwanagar and Rájpurá to Songad, inspected the office of the Superintendent Káthiáwád Circle and work in a few villages. The office was in very good order, and the work well performed. Returned to Broach viâ Rájpurá, Wartej and Gogo, in which latter place I inspected the dispensary and vaccination in the town. These were found satisfactory. Inspected work in the Broach and Ankleshwar Tálukás of the Broach Collectorate, Northern Circle, and finding it correct, proceeded to the Native State of Rájpiplá along the Narmadá River

to meet the Superintendent of the Rewá Kánthá Circle. I examined his office records (which were not so satisfactory as might be) and work in several villages. I also enquired into the conduct of one of the State vaccinators, then under suspension, and sanctioned his dismissal. From Rájpiplá I returned through the Rájpiplá State to Ankleshwar. Thence, by train, I went to Bombay, and made inquiries regarding vaccination in the Presidency Circle. Thereafter visited the Western Circle, and in company with Mr. Cody travelled through the Alibág and Pen tálukás of Kolábá Zilhá and a part of the Tháná Zilhá, visiting the villages as well as the Pen Dispensary en route. During my tour I saw some good work, and found Mr. Cody's office in a satisfactory state. As far as vaccination is concerned, at least, the Pen Dispensary stands much in need of improvement. In a population of 6,514 only 53 successful operations were performed during the past year. This gives less than five operations per month and only one per week. Shortly after leaving the Western Circle, in the month of January, I proceeded to Karáchí by steamer, from Karáchí to Kotrí by rail, and thence viâ Haidarábád, Ghotáná, Gulám Alijo Tándá, Digrí, Ján Mahammadjo Ghot of the Haidarábád Collectorate, and Dhadelá and Nabisar, of the Thar and Párkar District, to Umarkot. I there met Dr. Williams, the Superintendent of the Sindh Circle, inspected the office records, which were not very correct for the period antecedent to the return to duty of Dr. Williams ; but, from the date of his resuming charge, he had applied himself with much assiduity to putting things in order, and had so far succeeded. Inspected the dispensary and vaccination in the town of Umarkot. The only remarkable thing I observed was the large number of absentees, many of the names registered were those of children said to belong to other places, and to foreign territory, and it did not appear to me possible to be certain of the correctness of the register (see para. 62). What work I saw was fairly done. Marched through the *tálukás* of Umarkot, Thar and Párkar District, and Digrí and Haidarábád of the Haidarábád Zilhá, inspecting the villages en route, and found the work correct, except in the matter of absentees. Altogether I was more than a month in Sindh, marching almost continuously, and returned to Bombay by steamer early in the month of March. From Bombay returned to Púná, and, having made hasty preparations, proceeded to Belgaum, through the Púná and Sátárá zilhás of the Central Circle. I reached Belgaum on the 18th of March, examined the office of the Superintendent, the Charitable Dispensary, and the work of two vaccinators. The office and the dispensary were not satisfactory. I also made a strict enquiry into the fitness of the probationary Assistant Superintendents of Vaccination, two of whom had been reported on unfavourably by Mr. Lewis. I found two of them quite unfit for appointment, and directed their return to their former duties. A successor to one of them on probation has been appointed, and another will be so, soon.

70. In conclusion I have to apologize for this Report being later than usual in preparation for the press. This delay is due entirely to the delay in the receipt of the report of the Sindh Circle Superintendent and a few of the army returns. But for the late receipt of these, the Report and statements would have been ready for the press quite a month ago.

P. S. TURNBULL, M.D., Surgeon,
Acting Superintendent General of Vaccination,
Bombay Presidency.

Púná, 29th June 1873.

EXTRACTS

FROM THE

REPORTS OF SUPERINTENDENTS OF CIRCLES.

CENTRAL CIRCLE.

Superintendent.—Surgeon P. S. TURNBULL, M.D., (Acting Superintendent General).

Acting Superintendent.—Assistant Surgeon J. ROBB, M.B.

Establishment.—6 Assistant Superintendents, 2 Clerks, 63 Vaccinators under Local Funds, 16 under Municipalities, and 6 under Native States. Total 85 Vaccinators, and 20 Dispensaries.

Population 5,124,984. Total cost Rs. 36,317-6-6. Average cost of each successful case 5 annas 9 pies, or 3 annas 6 pies excluding Government expenditure.

Establishment.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those unknown from the Total.	
			Increase.	Decrease.		In Primary Vaccination.	In Revaccination.
Government	187172.	19,531	.....	.....	18,225	95·0	71·2
	1872-73.	.....	.....	19,531	.....	.....	.....
Municipalities ...	1871-72.	19,217	.....	.....	16,831	92·3	55·4
	1872-73.	14,946	.....	4,271	11,802	92·4	51·8
Local Funds	1871-72.	61,460	.....	.....	56,278	95·6	79·1
	1872-73.	93,560	32,100	.....	83,361	94·8	77·3
Native States ...	1871-72.	6,184	.....	.....	5,585	92·2	51·7
	1872-73.	5,631	.....	553	4,922	92·4	100·
Dispensaries	1871-72.	4,585	.....	.....	3,845	89·9	75·5
	1872-73.	4,250	.....	335	3,501	92·4	39·6

This is the first complete year of report since the reorganization of the Department. The results of the working of the new scheme will be viewed with interest on that account.

Progress.

2. Excluding dispensaries, there is a total increase of 7,745 persons vaccinated over last year's returns, and this is satisfactory; but the above analysis of the whole Circle shows a decrease in each establishment except Local Funds, where a greater or less increase was to be looked for. The causes of increase and decrease, so far as they are known, will be noticed in the paras. referring to each establishment.

3. In addition to the total increase above, a further increase must be credited to this establishment, corresponding to the total decrease shown against Municipalities and Native States. The same result is explained by the following figures :—

Local Funds.

Establishment.	Years.	Total persons vaccinated.	Increase.
Government	1871-72	19,531	
Local Funds		61,460	
		80,991	
Local Funds	1872-73	93,560	12,569

So favourable a result, I think, is mainly due to the constant and careful supervision of the Zilhá Assistant Superintendents of Vaccination, who are now in a position to keep their vaccinators closely up to their work. I do not think much of the favourable result can be attributed to any marked appreciation of vaccination by the people beyond that of former years. Still it is satisfactory to have no backwardness, in this respect, to record. Shortcomings are very often due to the want of that sympathy with the vaccinator which might be shown by the various local authorities. It is not so much any active opposition that is to be complained of, as a plainly passive indifference on the part of those who, from their local influence, would be expected rather to lend an impetus to the work. If a Mámlatdár seem to show little interest in a vaccinator's operations, Pátils and Kulkarnís are not slow to take their cue from their immediate superior, and thus villages, perhaps a whole táluká, become infected. In Nándgám Táluká it was clearly evident to me, when traversing that portion of Násik Zilhá, that the general feeling in the matter of vaccination was not as it ought to be. The vaccinator, a willing but timorous lad, has repeatedly complained of the want of local assistance, and although the Mámlatdár promised to give his assistance to the vaccinator, when this backwardness was pointed out to him personally, yet no material improvement is apparent from the vaccinator's returns.

4. That there should be so great a decrease under this head is somewhat disappointing. The towns which support vaccinators are generally large, and require all a vaccinator's care and attention. I can account for the decrease in no other way than from diminished energy on the part of these vaccinators during the year, making due allowance for incidental sickness, leave, &c., among them. Koregám Municipality reduced their vaccinator from the beginning of the official year, and although some set off might be made on this account, it is to be noticed that a new municipal appointment was made in Náráyangaum and Utur in Púná Zilhá from the same date. These towns, if they may be called so, are not large, and the work of the vaccinator since his entertainment is not very creditable. He is continually ailing, and, unless he shows himself to be a more efficient worker, it will be necessary to supersede him. Municipal Committees, I think, could accomplish a great deal for their vaccinators by directly interesting themselves in their work. Countenance in this way would tend to make the vaccinators anxious to work well, and to deserve the confidence of those by whom they are supported. Regarding the Dhúlía Municipality, it has been ruled by them, after protracted consideration, that no peon shall be allowed to the vaccinator. This, I take leave to say, is something like the penny-wise and-pound foolish principle. If vaccination is meant to be carried forward in

Municipalities.

any place successfully, a peon, specially set apart to assist the vaccinator, is an absolute necessity. Otherwise the efforts of the vaccinator will be fluctuating and uncertain.

Native States.

5. The decrease under this head is not considerable comparatively, but there is reason to be dissatisfied with much of the States' work. It is not so much on account of a falling off in the number of operations, as on account of the irregular and uncertain manner in which many of the vaccinators discharge their duties. They are frequently in arrears in the despatch of their monthly returns, two or three, it may be, being submitted together, notwithstanding repeated calls from the office; and, again, they do not scruple to leave their duties without reference to the Superintendent, if they seem to obtain the Chief's sanction to do so. An improvement would take place if it were carefully impressed upon the Chiefs that they have a responsibility beyond the mere giving a certain sum of money for vaccination purposes. They ought to look for money's worth in the men appointed and in the work they accomplish. Penth, especially, has been backward during the year, and the A'tpadi vaccinator, though not much behind in his work, deserves censure on account of his irregularities.

Dispensaries.

6. Dispensary vaccination is still behind but not to any great extent. The officers in charge invariably report the unwillingness of the people to send their children to be operated on, and especially are the parents reluctant to having the fresh lymph taken from their children's arms. Lymph thus becomes exhausted, and operations are interrupted. As far as I have been able to learn, the spirit of Circular No. 1003 of the 21st March 1872, from the Inspector General of Hospitals, has been generally acted up to, yet the establishing of certain vaccine stations, for the benefit of the inhabitants, has not resulted in a proportionate increase of operations. The people fail to appreciate the advantages a paternal Government is putting in their very way. It has occurred to me as strange that dispensary officers complain of popular apathy more than the general vaccinators do. With the medical knowledge they are supposed to possess, Hospital Assistants, and others in charge, are in a position to set before the people intelligently the benefits to be derived from successful vaccination. They are, at the same time, many of them, wonderfully inexpert in manipulating the lancet and tubes, and I venture to think that some special training in these particulars would impress them with the idea that the work is as much theirs, and demands as much attention, as the general dispensary duties. They would not, then, have to make the complaint that the ordinary morning work in the dispensary leaves them no time to procure children for vaccination, and that to do so would necessitate closing the dispensary—an alternative not allowed by the Medical Department. The time suggested to them, therefore, is from 10 A.M. to 4 P.M., when, it is needless to say, few children of the working classes can be had. The early mornings from 6 to 8, adopted by vaccinators with little or no difficulty, present opportunities for operating as well as for inspection purposes, more favorable than any other time of the day. Surely before dispensary hours some dispensary servant might be able to get together a few children for operation during dispensary hours as part of the regular work; or dispensary vaccination days might be set apart, not, however, to the exclusion of other work, if time remained. It is in these dispensary and municipal towns, where is held the weekly market, and, it may be, an occasional fair, that small-pox finds its footing most readily, to be again spread over the surrounding villages with the breaking up of the next weekly market or fair, and, therefore, thorough protection of all unprotected persons cannot be too soon or too anxiously looked for.

Vaccinators.

7. Viewing the Circle as a whole, they have worked well during the year. Deserving of special mention are Tátiá Dhondeo of Wálwá, Dhondo Chintáman of Sátárá, Kesheo Shiddheshwar of Hawelí, and Wáman Kesheo of Wái. Three of these belong to Sátárá Zilhá, which continues to

maintain its position as the best vaccinated of all the zilhás in the Circle. I may mention, however, that these three men were transferred from the Púná and Nagar and Sholápur zilhás only in the year 1871.

Changes.

8. During the year three casualties occurred, four vaccinators were dismissed on account of continued inefficiency, disobedience, or falsification of returns, and, as noticed above, the municipal vaccinator of Koregám was reduced, while a new municipal appointment was made in Náráyangáum and Utur in Juner Táluká. Except the last mentioned, all of these changes have tended to reduce the working strength of the Department, and presumably the amount of work done.

Effective and actual strength.

9. The following figures have been tabulated to show the effective strength of each establishment, in each zilhá, and the actual strength during the year, calculated from the number of monthly returns received :—

Collectorate.	Local Funds.		Municipalities.		Native States.		Total, excluding Dispensaries.		Dispensaries.		Circle Total	
	Number of Vaccinators.	Their Value.	Number of Vaccinators.	Their Value.	Number of Vaccinators.	Their Value.	Number of Vaccinators.	Their Value.	Number of Vaccinators.	Their Value.	Number of Vaccinators.	Their Value.
Púná.....	8	7 7/12	5	4 4/12	...	...	13	11 11/12	5	3 4/12	18	15 3/12
Nagar	11	10 2/12	1	1	...	...	12	11 2/12	2	1 1/12	14	12 3/12
Násik	10	8 8/12	1	1	1	8/12	12	10 1/12	2	1 8/12	14	12
Sholápur	6	5 10/12	3	3	1	1	10	9 10/12	4	3 10/12	14	13 9/12
Khándesh	16	15 1/12	1	1	...	...	17	16 1/12	3	2 8/12	20	18 9/12
Sátárá	12	11 11/12	5	4 8/12	4	4	21	20 7/12	4	3	25	23 7/12
Total.....	63	59 3/12	16	15	6	5 8/12	85	79 11/12	20	15 8/12	105	95 7/12

The weakness of the year is exposed both as regards particular establishment and the particular zilhá where it lies. From this table it will be seen that, excluding dispensaries, there has been a loss during the year equal to the work of five vaccinators *plus* a month's work of one of them: and including dispensaries, a loss equivalent to the work of nine vaccinators *plus* nearly half a year's work of one of them. That is, on account of the changes noticed in para. 8, tálukás and municipalities have had to lie vacant for months on end, because of the difficulty experienced in filling up a vacancy at once. Candidates are not wanting, but they are not always willing to comply with the necessary conditions of appointment. These are not unreasonable, considering the importance of the work to be engaged in. Candidates are required to serve a short time (not less than one month) in the Superintendent's office to become acquainted with the meaning and use of forms, tubes, lancet, &c., and a further probation, of one month at least, is necessary under some expert vaccinator with whom they will see and learn the work practically. Besides, an intelligent knowledge of Maráthí, and ability to write that language distinctly, are required. Also a candidate must bear a good character, and be under 25 years of age. Because pay is not allowed during this

time of probation, candidates cannot be made to see that they are gaining in another way. All of them hope and pray that they will be "confirmed by your honour in the vacant situation by return of post."

In addition to absolute vacancies, sickness and leaves sometimes account for blank returns. With regard to leaves, vaccinators are reminded that such are not granted if small-pox is reported to prevail in their tálukás.

Assistant Superintendents.

10. The results of the year under report I think amply justify the employment of this class of men in the Department. As they become more and more acquainted with the precise nature of their duties, and how most successfully to deal with matters that come before them, there will be a marked change in the character and quantity of vaccinators' work. A reference to Table VII., annexed, will show that their labours during the year have been creditable to all of them. Especially worthy of mention are Mr. Trimbak A'nant, of Púná Zilhá, and Mr. Bálkrishna Rájárám, of Sátárá Zilhá, who have shown considerable tact and energy in dealing with several vexed points that have come under their notice. Mr. Dharmá Bápu, who was only temporarily employed in Nagar Zilhá, worked well. He is an old and trustworthy servant of Government, and has had large experience as a vaccinator. But, on account of years, he is not possessed of that activity and endurance which are indispensable to an Assistant Superintendent, and he will, therefore, revert to his original appointment as head vaccinator in Násik. The Assistantship thus vacant will be filled up by Mr. Kisansing Dowlatsing, the head clerk in this office. He has proved himself a shrewd and intelligent worker in the office, he has on all suitable occasions taken the pains to become thoroughly acquainted with the practical duties of a vaccinator, and he is young and of active habits. His future exertions, I trust, will combine to justify the recommendation that has been made in his behalf.

It may be necessary here briefly to enumerate the particulars of service in which the Assistant Superintendents have been of special value, in the experience of the past year—

(1) Vaccinators have been closely looked after, have been kept well up to their work, their weak points and shortcomings have been detected, and promptly reported to the Superintendent.

(2) Outbreaks of small-pox owe, in a great measure, their speedy suppression to the ready and willing exertions of the Assistants. Instances of this have been many during the year, but it may suffice to single out two or three for record.

In the early part of 1872 small-pox prevailed in the Káthí State beyond the north-western limit of the province of Khándesh. Previous to this, the disease had made its appearance at Máhijí, where a great annual fair is held. At this place Mr. Bálkrishna Gopál, the Assistant Superintendent of Vaccination in Khándesh, was hard at work in company with the Pachorá vaccinator, and had so far carried matters to a satisfactory termination when the report came from the Káthí State that the disease was spreading rapidly. Mr. Bálkrishna Gopál found that he could leave Máhijí, and at once proceeded to the extreme opposite corner of his zilhá, where, with the assistance o the Taloda vaccinator he set about protecting all unprotected persons to be found in the State. In a comparatively short space of time matters had progressed so favourably that both the Assistant (to whom credit is due for his zeal on this occasion) and his vaccinator could proceed to their general duties.

In May of last year the disease threatened to spread in Satáná of Násik Zilhá, but the immediate assistance of Mr. Rámji Khanderáo and the vaccinator confined the outbreak within manageable bounds, by giving protection to a large number of children in the affected locality.

Again, in Shelgáum, a village in Sholápur Zilhá, consisting of more than two hundred houses, no fewer than 100 children were attacked by small-pox. This was discovered by the

Assistant Superintendent, and vaccination was set agoing at once before any report had come from the village officers through the táluká Mámlatdár. In this place no small-pox register had been kept up.

Assistant Superintendents can, where necessary, bring the exertions of at least two vaccinators to bear upon any locality where small-pox has established itself.

(3) In cases where young vaccinators have met with difficulties in prosecuting their labours, Assistant Superintendents have been generally successful in smoothing the way for them by explaining to the people the advantages of vaccination, and particularly that no harm can result from taking lymph from the ripe vesicles.

(4) They are careful also to see that all village vaccination registers are properly kept and stamped. Where small-pox registers are not kept, report to that effect is made to the Superintendent, who takes steps to bring the neglect to the notice of the Revenue Officers.

Sex. 11. The proportion of the sexes vaccinated remain almost the same as it was last year,—51 per cent. males to 49 per cent. females.

Caste. 12. Under this head 86·8 per cent. are Hindús, the remaining percentage of 13·2 being distributed among the other castes.

Age. 13. The percentage with respect to age is 33·8 and 66·2 of children under and above one year respectively. The increase over last year in favour of infants is 3·5 per cent., an increase anticipated by Dr. Turnbull in para. 11 of his last year's report. It is to be hoped that infant vaccination will go on steadily increasing.

Lymph. 14. The lymph employed during the year has been generally reported to be good. Where signs of deterioration have been seen, from small and imperfectly developed vesicles vaccinators have been directed to begin anew with a fresh supply. The deterioration is not of the lymph *per se*, which, I believe, may be transmitted through a thousand cases with undiminished activity, but because vaccinators are sometimes not careful to reject all but the first drop or two that may exude from the vesicles. A tube filled with good lymph shows transparent as water; if blood or the serum of the blood has been abstracted (as it is sure to be if a vesicle is drained) then the contents of the tube will appear hazy. On two occasions English lymph was received from the Superintendent General of Vaccination, and the following is the result of its use :—

Date of Receipt.	Number of Children.	Age.		Number of Punctures.	Number of Vesicles.	Percentage of Success.
		Under one year.	Above one year.			
November 1872	7	7	.....	28	22	78·5
January 1873	10	9	1	41	21	51·2
Total.....	17	16	1	69	43	62·3

This lymph was largely distributed among the vaccinators of the Circle. Besides, lymph has been frequently supplied to several military and civil charges within the Circle and to other stations beyond the Circle, chiefly in Central India and the Central Provinces.

15. The cicatrices examined in the course of the inspection tour have generally been large, round, and foveated, but varying in number according to the number of original punctures made, and to the proportion of success attending the vaccinator's labours. Some vaccinators make from three to six punctures on one arm only, others three on each arm, and so on, according to their various ideas in the matter. To ensure uniformity, I think the plan would not be a bad one, to direct all vaccinators to make a certain number of punctures on one or both arms, and, I think, six punctures ought to be required of them, three on each arm. There is thus allowance made for failures, and, moreover, Superintendents and their Assistants would be able at once to estimate the average quality of a vaccinator's work. As a result of my inspections, I am of opinion that not fewer than three good large cicatrices give sufficient and lasting protection. On one occasion particularly, at the beginning of this season's tour, I was in a position to satisfy myself on this point. In the village of Kámbargáum 87 cases of recent small-pox were reported by the First Assistant Collector of Nagar to be borne on the small-pox register. In going over this register carefully, on the spot, I found that a number of previously vaccinated children had been attacked by small-pox, and where vaccination cicatrices, which averaged two in number, could be distinctly seen, the cases had been no other than very mild ones—no unseemly scarring, no unhealthy ulcerations, no loss of eyesight. This was worthy of notice as proving the efficacy of even an imperfect protection from vaccine lymph.

Cicatrices.

16. The number of these is 50 per cent. less than was shown in last year's returns. This is owing directly to a more correct understanding of the meaning of the term, rather than to any falling off in his respect. The percentage of success is lower than last year, but calls for no special remark.

Re-vaccinations.

17. The disease has been very general throughout the Circle during the year, but on no occasion has it been allowed to exceed manageable limits. Prompt and active assistance has been rendered in every quarter where the disease was reported to exist, and with invariable success. It is still to be regretted that very many people cannot be brought to think that they do incalculable harm in a neighbourhood by allowing small-pox to run its course in their midst. Their deity so ordains it, and it would be unwise, say they, to interfere in the matter in any way whatever. It was recently a question at home whether small-pox could be cured by vaccination. A Mr. Furley of Edinburgh stated that such a result could be obtained under certain necessary conditions, while Dr. Grieve of the Hampstead Hospital, London, conducted a series of experiments showing that not only was Mr. Furley's theory fallacious, but that in many cases local and sometimes general mischief was done to the patient by the practice recommended. The late Mr. Duff, Collector of Khándesh, forwarded to me an extract from some "home" paper on this subject, and kindly volunteered to have the extract translated for the use of the Local Fund Vaccinators in Khándesh, if it could be of any use to them. Meanwhile the question was being discussed in the medical papers at home, and it was thought advisable to defer any action in the matter, until the practice had been fairly and thoroughly tested.

Small-pox.

18. On the subject of animal vaccination I need say nothing. Indeed I am not in a position to say much in the matter. Sub-Assistant Surgeon Bálkrishna Chintobá has carried on the work in Púná, and in his report, which is appended, he details in full his experience during the year.

Animal Vaccination.

19. Throughout the Circle these registers are generally carefully kept. During my tour, where small-pox registers were found wanting, the village officers were directed to make up such, and to bring

Village Registers.

them to the office to be stamped and paged. Where irregularities in keeping the registers were noticed, the case was laid before the proper authorities.

Inoculation.

20. About the end of the official year it was reported that this system was being practised in the Native State of Bhor. The Chief wished to know on what grounds, and how he might deal with the case. Through the Political Agent it was communicated to the Chief that the practice was dangerous to life, and punishable under Chapter XVI., Section 324, of the Indian Penal Code. No further report has been made on this subject.

Vaccination-Syphilis.

21. No case of vaccination-syphilis has been reported or discovered during the year. I am doubtful whether it would be possible to demonstrate very clearly a case of this kind, did the necessary conditions of its appearance exist; so common and obscure are skin diseases among a people revelling in filth, and naturally predisposed to hydrophobia in its very literal sense.

Aids from Civil and Political Authorities.

22. My acknowledgments are due to all civil and political authorities for the cordial and able assistance they have given to the Department during the year. The late Mr. Duff, Collector of Khándesh, expressed himself as always anxious to do what he could to further the spread of vaccination. His death is much to be regretted.

23. I would here advert to the auxiliary service to vaccination, which, I believe, could be done through the agency of district schools. If schoolmasters were willing and themselves convinced of the value of vaccination and re-vaccination, they might do much by explaining to their pupils why Government pays so much attention to this matter. A simple and instructive lesson on vaccination might be introduced into some of the vernacular standards prepared for the use of schools; and the regular visitations of the Educational Department would be the means of bringing out what the pupils knew and understood on the subject. I am not certain that the pupils would make much way at first with their parents and friends at home, but there would be a quiet and steady sowing of good seed in the minds of the rising generation that could not fail to bear good fruit in time to come. There is a large and growing element of shrewdness and intelligence in those district schools, and it seems a pity not to take advantage of such to foster a work, the importance of which has not yet led the Government to legislate in the matter.

Tour.

24. I received charge of the Circle from Dr. Lewis about the end of last travelling season, at the southern limit, and my frequent and hurried marches to Púná did not permit of much more than office work being done on the way. The work of the present district season lay chiefly in Khándesh, and travelling towards that, several tálukás of Ahmadnagar and Násik were examined. Up to the close of the official year the central and eastern portions of Khándesh were traversed, comprising ten tálukás. It was found necessary to leave Chopde aside, because considerably beyond my plan of inspection, and the season drawing to an end, left little time to complete the examination of the other tálukás, which lay more directly on my way towards Púná.

Khándesh is a very extensive Collectorate, and a whole season's tour could be profitably spent in traversing its sixteen tálukás.

It is unnecessary to extend these remarks. The particulars of tour are to be found summarized in Table VII., which is appended.

The Office.

25. The entertainment of a second clerk, recommended by Dr. Gordon, was sanctioned by Government during the year. The appointment was filled up on the 1st July 1872, and the present probationary incumbent is a conscientious and painstaking worker, but

rather slow. Kisansing Dowlatsing has conducted the duties of head clerk to my entire satisfaction.

Regarding the number of peons belonging to the Office Establishment, I gladly endorse Mr. Cody's recommendation in the closing sentence of his last year's report, and for precisely the same reasons he has given for making the recommendation.

26. In conclusion, I venture to express my humble appreciation of Dr. Wright's remarks in paras. 13 and 14 of his letter submitting the report of last year to Government, Para. 14 especially carries weight with it. To be able to deal personally with village authorities and others concerned, in the course of village inspections, Superintendents ought to be at least colloquially acquainted with the vernaculars of their Circles. Interpretation is all very well in its way—and the kárkuns have in this respect done their best for me on all occasions where necessary; but, unless the interpreter is thoroughly conversant with our rather complex English idiom, the precise meaning to be conveyed is sure to be lost. Such, I have reason to think, is not seldom the case in dictating vernacular correspondence. I speak from my own experience, which, on inspection occasions chiefly, has been sometimes painfully irksome and unsatisfactory, because of my ignorance of the Maráthí language.

Camp Násik, 16*th May* 1873.

SOUTHERN CIRCLE.

Superintendent.—Assistant Surgeon J. RABY (on leave).

Acting Superintendent.—Surgeon H. A. LEWIS.

Establishment.—5 Assistant Superintendents, 2 Clerks, 36 Vaccinators under Local Funds, 6 under Municipalities, 22 under Native Chiefs, and 16 Dispensaries.

Population 4,455,796. Total cost, Rs. 31,186-1-7. Average cost of each successful vaccination.

Establishment.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those unknown from the Total.	
			Increase.	Decrease.		In Primary Vaccination.	In Re-vaccination.
Government... ...	1871-72.	9,384	.....	.....	8,483	94·8	88·5
	1872-73.	.....	.....	9,384	.....	.....	.....
Local Funds... ...	1871-72.	30,689	.....	.....	27,538	92·3	56·8
	1872-73.	39,804	9,115	.....	34,149	90·8	51·1
Municipalities ...	1871-72.	5,108	.....	.....	4,546	91·0	75·4
	1872-73.	4,717	.....	391	3,965	91·9	59·1
Native States ...	1871-72.	22,446	.....	.....	20,400	87·2	63·4
	1872-72.	25,502	3,056	.....	21,856	92·3	72·8
Dispensaries... ...	1871-72.	1,364	.....	.....	1,197	89·9	77·5
	1872-73.	3,510	2,146	.....	2,954	86·6	54·2

Progress.

I regret I am unable to state anything fully as regards the progress of vaccination in this Circle, owing to my having given over charge to Assistant Surgeon Raby before the close of the official year, and from want of information, as all the returns had not been received. I have only received the number of "Total vaccinated" in the Collectorates of Belgaum, Dhárwár and Kaládgí, and the Municipalities, in all of which there is a decrease, chiefly owing to illness and leave granted to vaccinators, and to some amount of opposition on the part of villagers.

Lymph.

2. The lymph used during the year was generally reported to be good, but on several occasions during my tour I found that it ought not to be so termed, judging by the resulting vesicles. In some instances while in the Kaládgí Districts I noticed that some of the vaccinators had been in the habit of using lymph taken from too ripe vesicles. But still, on the whole, the lymph has been of good quality, and the supply well kept up. In only one instance did a vaccinator (of the Ron Táluká) fail in his supply, and this was owing to the reluctance shown by parents in

permitting lymph to be taken from the arms of their children. Two supplies of lymph were received from the Privy Council, through the Superintendent General, during the past year. Several children were vaccinated with the first supply when I was in Badámí, but in every case it failed. With the second supply, used in February last at Bijápur, three children were vaccinated, but only one vesicle resulted from 18 punctures. From this good lymph was extracted, and with it five children were successfully vaccinated, as subsequently reported by the municipal fund vaccinator.

Animal Vaccination.

3. This was not practised in this Circle during the past year.

Small-pox.

4. Small-pox of a mild type occurred chiefly in the Kaládgí Zilhá, in the tálukás of Indí, Mudebihál, and Bágewádí; but last January a severe outbreak was reported in the Kánadá Zilhá, which was timely suppressed.

Inoculation and Vaccino-Syphilitic Inoculation.

5. No cases of inoculation with small-pox virus, or of introduction of syphilis by means of vaccination, have come to my notice.

Assistant Superintendents.

6. These appointments have been given to men who originally entered the service as vaccinators; many of them are, consequently, not sufficiently efficient for holding such responsible posts. Two out of the five employed in this Circle, including the Kolhápur States, have been reported by me as being unfit for the work; one, the Assistant Superintendent of Belgaum, Venkatráo Subhráo, being not only physically unfit, but he is not sufficiently intelligent, nor active enough for the discharge of his duties in an efficient manner. The other, Jayarám Krishná, Assistant Superintendent of Kaládgí, has a very imperfect knowledge of Maráthí and Kánadí, and has displayed very little zeal for his work. He reverts to his former grade as a vaccinator, and is now employed as such in the Hublí Táluká. Of the three others, although I am of opinion that they have not that amount of education necessary for holding such appointments, still on the whole and under the present circumstances, when it is difficult to find better qualified men, I consider that they have done their work satisfactorily.

Conduct of Vaccinators.

7. I have had occasion to impose small fines on several vaccinators, for sending in incorrect returns, at different times during the year. The Bágalkot Local Fund Vaccinator, Raghunáth Trimbak, was fined in 1871-72 by Dr. Robb for falsifying returns. A repetition of this offence was detected during the past year, and he was dismissed the service, as was also Rámchandra Malhár, State Vaccinator of Torgal, for a similar offence and disobedience of orders. A few others have shown some amount of indolence, and were fined. Speaking generally, I consider that the behaviour of the vaccinators in this Circle has been good.

Registers.

8. The form of village vaccination register advocated by the Superintendent General is now used in almost every village in this Circle. The form, I consider, is a very useful one, and acts as a valuable check upon vaccinators.

Vaccination in Native States.

9. I am glad to state that greater attention is now being paid to the subject of vaccination bythe Native Chiefs. The Chief of Jamkhandi has lately sanctioned the maintenance of a vaccinator in the Kundgal Iláká; the Chief of Miraj, one for Lakshmeshwar; and the Chief of Sánglí has also consented to appoint a vaccinator for the Shirhátti Iláká.

10. The Gokák Municipality have, at my suggestion, appointed a vaccinator, the work being too heavy to be carried on by the hospital assistant in charge of the dispensary, unaided. The Kaládgí Municipality have been, on the other hand, obliged to dispense with the services of the vaccinator, for want of funds.

Municipalities.

11. I commenced my tour early in November, and chiefly inspected the Kaládgí Districts and some of the bordering Native States, viz., Jamkhandí, Mudhol, and Kurundwád, for the full details of which I beg to refer to the Statement No. VII.

Tour.

12. A second kárkun has been added to the office permanently, as the work connected with the vernacular correspondence was found to be too much for one kárkun to attend to. The office is allowed only three peons; the number, I think, is insufficient, as I have often experienced great inconvenience when on my tour of inspection, in having the children collected. I would, therefore, beg respectfully to recommend an increase of the number of peons to four.

Office.

13. Before closing this report I have much pleasure in recording the great assistance afforded me, at all times, by the civil and political authorities.

Civil Authorities.

Belgaum, 21*st April* 1873.

WESTERN CIRCLE.

Superintendent.—Assistant Surgeon T. Cody.

Establishment.—3 Assistant Superintendents, 1 Clerk, 27 Vaccinators under Local Funds, 2 under Municipalities, and 3 under Native States. Total number of Vaccinators, 32.

Population 2,534,687. Total cost, Rs. 22,511-14-11. Average cost of each successful vaccination, Rs. 0-5-8.

Establishment.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those unknown from the total.	
			Increase.	Decrease.		In Primary Vaccinations.	In Re-vaccinations.
Government	1871-72...	11,942	...	...	11,670	96·5	86·2
	1872-73...	.....	...	11,942	.....	...	...
Local Funds	1871-72...	45,894	...	...	43,503	95·9	75·1
	1872-73..	59,731	13,837	...	54,229	94·0	63·9
Municipalities.....	1871-72...	2,061	...	...	1,967	95·4	52·6
	1872-73...	1,108	...	953	954	91·3	44·4
Native States.....	1871-72...	5,270	...	...	4,813	94·6	73·8
	1872-73...	8,973	3,703	...	8,209	94·8	75·8
Dispensaries	1871-72...	1,392	...	...	1,173	89·1	48·8
	1872-73...	2,151	759	...	1,711	84·7	61·6

In submitting my report for the year 1872-73 I have to show an increase in the number of persons treated, over the year 1871-72, to the extent of 5,404. Taking the total of all the establishments, connected with the Circle, the number of persons treated in 1871-72 amounted to 66,559, and in this year it reaches 71,963; thus showing the large increase I have just quoted.

Increase.

2. Taking the establishments in detail, the increase is not general, there being a decrease in Government and Municipal establishments. With regard to the former I have to state that it ceased to exist in the year 1871-72, so that this year there has been no work performed under that head, the whole being credited to Local Funds, from which source all the vaccinators in this Circle are now paid; and to the latter I think the decrease may be attributed more to the performance of work in arrears during the previous year than to any falling away in this, though still I think there is much room for improvement in the town of Thánà. In this town, too, there was a break of work consequent on the removal of the vaccinator employed last year, who was replaced, towards the close of the year under report, by one who I expect will be more industrious, and show better results. The increase, therefore, is distributed over the Local Funds, Native States, and Dispensary Establishments.

Local Funds Vaccinators.

3. Under this head there were 27 vaccinators employed during the year, viz., 11 in the Tháná Zilhá, 11 in the Ratnágirí Zilhá, and 5 in the Zilhá of Kolábá. This number gives one vaccinator for each táluká in the first and last, while in Ratnágirí there are three men in excess of the number of tálukás comprising it, who have, however, been kept busily employed in the petás of Vengurlá, Khed, and Lánjá. The numbers employed in the Ratnágirí and Kolábá Zilhás are quite sufficient for their requirements, but I think the number of vaccinators in Tháná ought to be increased to at least 13. My reasons for making this suggestion, notwithstanding the liberal support that the Local Funds give to vaccination already, are that some of the Tháná tálukás possess petás which included with the tálukás themselves render them too large to be reached by one vaccinator with efficiency; and the opposition met with is such as to greatly curtail work by absorbing much time in efforts to overcome it. Were this opposition not existent, it might be possible to manage with one man to each táluká, but as matters at present stand (and I see no reason to expect a better change), it is out of the power of one individual to answer the requirements of the larger ones. In outbreaks of small-pox, too, I find it nearly impossible to detach, with any degree of security, any of the vaccinators to render assistance; and in explanation of this I may state that during the monsoon an outbreak of small-pox occurred in the Mokhádá Petá, Sháhpur Táluká, to the scene of which I directed the vaccinator to proceed. He had, however, but a very short time gone to the petá to work, when I received a report from the Mámlutdár, saying his presence was required in the neighbourhood of the táluká town itself. As Mokhádá, or rather the northern frontier of it, where he was working, was so far removed from Sháhpur, some 50 miles or more, I directed the Kalián vaccinator to proceed to Sháhpur to give assistance, but he had not been there long before he was required to return sharp to his own táluká. A similar event occurred with the vaccinator of Máhim, who was sent to Bassein to render assistance, but who had to return to his own charge after a very short stay. One or two extra men would save the necessity for taking away those named to particluar tálukás, from their own charges, when cases of emergency arise, and there would be plenty of work for them in the hitherto almost unexplored—so far as vaccination is concerned at least—districts, running along the north-eastern and northern frontier of the Collectorate, some portions of which lie close under the Ghauts.

4. There have been some changes during the year amongst the men of this establishment, all of which took place in the Tháná Zilhá, and these changes combined with other influences I shall allude to further on, have tended to render the quantity of work performed here during the year less satisfactory than might be expected. Two men were removed from the service: one who worked in the táluká of Wádá and the other in that of Máhim; and another, who worked in the táluká of Murbád, died. The delay consequent on the filling up of these three vacancies caused a break of work, and breaks, too, in a few other instances were occasioned by illness. Notwithstanding every possible despatch in filling up vacancies and nominating substitutes, either can seldom be done without loss of lymph, and this once lost takes considerable time to set it fairly going again, which in the end tells with some effect on the returns. The conduct of the men, generally speaking, was satisfactory during the year, and their industry and attention to work were both active and close. There are a few exceptions to this rule, in which neither the conduct nor industry are such as to merit my approval; but I will not more particularly allude to this just now, as I hope for a future improvement. The 27 men of this establishment performed altogether 60,972 operations, giving an average to each man of about 2,258; but I must add that the lion's share of their operations is the right of the 11 men employed in Ratnágirí, who between them performed 38,034 operations, being an average of 3,457. This average is very high and speaks for itself.

5. As in the previous year, there were only two men employed by Municipalities in this Circle—one between Pánwel and Uran, and the other by the Thánà city. In the former case the man Máhádeo Bábáji worked both industriously and efficiently. In Thánà city the man who was employed last year tendered his resignation to the chairman of the Municipality, which was accepted, and thereby I was saved the trouble of having to recommend his dismissal. The present man employed is so far an improvement on his predecessor, that his returns, &c., are regularly despatched to this office, and also he appears to be making every exertion towards extending his operations. I think, however, it is a question now as to whether or not this man is required in Thánà, as the Hospital Assistant in charge of the Wádiá Charitable Dispensary has been carrying on vaccination work during the year, and I do not consider the available field sufficiently large to afford employment to both. I would prefer, however, his being retained, and the entire work being left to him, rather than to the dispensary, and my reason for this is that he will be able to carry vaccination from house to house, and thereby be in a more favourable position for extending it than would the medical subordinate in charge of the dispensary, whose many other calls may render it difficult to make such rounds. One or other must come to a stand still soon; and I think for many reasons, of which the foregoing is but one, it would be better to entrust the carrying on of the work to the itinerant rather than to the stationary vaccinator. The number of persons vaccinated by both municipal vaccinators during the year amounted to 1,108, being some 953 less than they treated in the year preceding.

Municipalities.

6. There are three vaccinators employed by Native States—one by Sáwant Wádí, one by Janjírá, and one by Jawár. With regard to the first, there has been no change or break of work during the year, and the number of persons treated by him—6,528—are of themselves clear proof of the attention he has paid to his work. He does not, however, perform all the operations himself, as he is aided by the peons allowed him by the State, all of whom he has taught to operate, and who now materially increase his returns. In Janjírá the man whom I placed there in February 1872, was removed at the expiration of a year, for which term His Excellency the Nawáb had agreed to entertain a vaccinator from British territory, and his place was supplied by a young man, native of Janjirá, who was instructed in the performance of the operation during the year, and who, since the appointment, has been giving every satisfaction. The returns from this State have been greatly increased since he commenced work, and I have every reason to predict that they will continue to be furnished at the same advanced rate. The Jawár vaccinator was absent from his work, in consequence of ill health, for a short time during the monsoon, his place being then supplied by a substitute; but with this exception he was steady at work throughout the year. The number of persons treated by him was 1,081, being 656 more than in the year 1871-72.

Native States.

The number of dispensaries from which returns have been supplied to this office has been increased during the past year by four, viz. Kelví Máhim, Bassein, Sáwantwádí and Mátherán. The two former were only established during the year, and, since the date of their being so, have been carrying on vaccine operations with varying monthly results. Sáwantwádí dispensary had not previous to this year carried on any operations in connection with it, but since the Sub-Assistant Surgeon in charge began to do so, he has paid considerable attention to the subject, with results that have made his returns far in advance of those supplied by any of the other dispensaries connected with this office. Mátherán, whence no return was supplied last year, has this year furnished one, showing 10 persons to have been treated, all of whom were operated on in the month of March. The total number of persons treated by the dispensaries amounted to 2,151, being an increase of 759 over the year 1871-72. Though the

Dispensaries.

increase is so far satisfactory, there is still room for improvement; and the exercise of a little more energy would, I think, in a few instances, be productive of much good. Under this head I would more especially allude to the dispensaries of Pen and Bhiwandí. On the other hand I can testify from personal observation to a strong desire and active exertion being displayed by those holding the charge of the Sáwantwádí, Kalián, Dápulí, and Alibag dispensaries, to extend their operations, and thereby afford a considerable amount of protection to the people in their neighbourhood. Reports from all the dispensaries have been submitted with their returns, so that it is unnecessary that I should more particularly allude to them here, as they themselves fully detail the difficulties, &c., encountered in propagating dispensary vaccination during the year.

Imperial Establishment.

8. As a separate report is to be submitted on the Assistant Superintendents, in accordance with Circular No. 44 of 1873-74, dated 4th April 1873, by the Superintendent General of Vaccination, I will not remark further on them here than to state, that I have, with one solitary instance, found them always ready and punctual in the performance of any duty I may have pointed out. The clerk has been most attentive to his duties, and I have had no reason to complain during the year of his neglect of any one of them. He has a good deal to do, for, despite all my efforts to curtail correspondence, &c., as much as possible, I find it growing apace.

Lymph and Vesicles.

9. The quality of the lymph, as exhibited in the result columns, used throughout the year was apparently less active than that in use during the year 1871-72; but this depreciation, as I think I can fully show, is more apparent than real. In the year 1871-72 the percentage of success for the whole Circle, excluding dispensaries, were 96·4 and 75·1 in primary and re-vaccination respectively, while this year the percentages are shown in either description of operation as 94·08 and 66·8. The chief reason, I entertain, for the lowering of the percentage of success to a still high rate, is not a depreciation of the quality of the lymph, but the result of a more correct rendering of the returns by the vaccinators, consequent on a closer and more frequent inspection of the work, and its comparision with the "results" as recorded. This makes the vaccinator more careful in filling in his register, as he now knows any attempt to make his work appear more efficient than it really is, will be almost certain to suffer detection, and he must reap the consequences. The lymph in use during the year has been both active and good, and the "results" submitted, if they be correct, as I have every reason to suspect they are, prove that, in giving so good a rate of success as 94·08 per centum in primary and 66·8 in re-vaccinations. I have seen the lymph in process of development of nearly every vaccinator whose charge I have visited, and I had only on one occasion to be dissatisfied with it. This instance was in the case of 3rd grade vaccinator Bhiku Rághu, then working in the Ratnágirí Taluká, whose lymph was so bad that I had to order him to stop work till I could replace it; and, as the man ought to have known better than to work with lymph which had been too evidently deteriorating for a time, I fined him heavily.

10. With nearly all the vaccinators I have experienced some difficulty in endeavouring to prevent their taking lymph from vaccinifers before it fully ripens. They invariably count the date on which they vaccinate, as well as that on which they extract the lymph in making their estimate, from dates, and thus when it ought to receive seven clear days it gets but six, much to its deterioration and inefficiency. I think myself that lymph ought to be always taken on the corresponding day of the week succeeding that in which it was used, and this I have been endeavouring to impress on the vaccinators as I visit them; but I think a ready means of securing this time being given to it, would be to have the days of the week printed on the weekly reports, and let the vaccinator write the dates over them. By this means

I could tell easily, from week to week, the time they give their lymph to mature, and be in a position to point out more particularly any want of proper attention to the subject.

Animal Lymph.

11. During the monsoon while at Ratnágirí I endeavoured to establish animal vaccination, but I am sorry to say the attempt failed. I inoculated most carefully two calves with lymph received from the Local Superintendent, Bombay, in tubes; but the result in both cases was *nil*. In one of the calves there was a slight appearance in the case of one of the scarifications inoculated with a tube of lymph Sub-Assistant Surgeon Anantá Chandrobá stated he had received from Dr. Warlomont of Brussels, but it was unfruitful as regards lymph.

12. I received a few tubes of animal lymph, once removed, from the Local Superintendent of Bombay, which resulted most successfully on use. I entrusted its care to Assistant Vaccinator Ganpatráo Haribá, of the Chiplún Táluká, Ratnágirí Zilhá, a careful and successful vaccinator, having seen, myself, the first vesicles resulting from it, and since then I have been able to distribute it in whatever cases I thought the lymph required renewing. These, however, were very few, for although I hold that lymph is very often enhanced in efficiency by renewal from the original source, I do not deem it advisable to repress that which is still giving true Jennerian vesicles, and in consequence I but used the lymph where I thought the vesicles inefficient.

13. Seven tubes charged with vaccine lymph supplied by the Privy Council, were forwarded to me for trial by the Superintendent General of Vaccination, the result of the use of which I here give in detail. Three tubes were forwarded with Superintendent General's letter No. 778 of 1872-73, dated 4th of November 1872, which I used myself on two children on the 11th of the same month. Six punctures were made on each child, three on either arm; but though used most carefully, when the children were seen again on the 18th, or 8th day, there was no sign whatever of the lymph having "taken". The four other tubes forwarded with Superintendent General's letter No. 934 of 1872-73, dated 3rd January 1873, were used by the Assistant Superintendent of the Kolábá Zilhá, Mr. Bálu Chálká, on January 9th, on five children, making six punctures on four, three on either arm, and three punctures on one. On the four first children vesicles appeared, five on one, four on the second, three on the third, and one on the fourth; and on the fifth child operated on one vesicle appeared. The vesicles on the first three children were very good, and the lymph from them was further extended by means of tubes; the two vesicles on the last two were small, and their lymph was not further used.

14. While on this subject I may state, as I have had occasion to do before, that in maintaining the good lymph the vaccinators have much to contend with in the opposition they meet with in selecting their vaccinifers. Every case does not show sufficiently good vesicles from which to extract lymph, while those which bear such a character are often debarred from the vaccinator by the refusal of parents to allow their children presenting such vesicles being made use of as vaccinifers. Bearing this in mind, and witnessing, as I have often done, how extremely prejudiced the people generally are, I am often surprised to see, and not a little puzzled to understand, how the vaccinators, with such odds against them, manage to get through the quantity of good and protective work they do, and still maintain the prophylactic innocent of communicating any evil consequences in its transmission. This would be no matter for surprise were the selections untrammelled; but made as they are, when the well-fed and well-cared for children of the better classes are altogether, I may say, shut out from the roster, I think, I may advance, as some evidence of the keen attention, as a rule, paid to work by the vaccinators, the absence of any accusation as to their operations producing ill consequences. One case was reported to me, it is true, from Rohá Táluká, Kolábá Zilhá, and bore so much of likelihood in the way the matter was put to me, that I at first was convinced of its truth; but a subsequent personal investigation exposed to me the fact that I had jumped at a hasty conclusion, and further that I had yet much to learn of the ingenuity with

which a certain class of people will pursue a steady course towards any end they may wish to attain. An infant, it was reported, died about a month after it had been vaccinated, and ill usage by the vaccinator and vaccination were given as the causes of its death. I will not enter into any detail of evidence advanced to sustain this charge, but will merely state that when I came to Rohá I enquired into the matter to the entire exoneration of the vaccinator, though the first receipt of the report made me somewhat prejudiced against him. The father of the child said the vesicles on its arms had dried up some time before its death, and that *fever* and not vaccination was the cause of that event taking place. In support of this statement made to me in presence of the Mámlatdár, I had the evidence of the child from whom it was vaccinated, and that of other children for whom it was used as vaccinifer, in none of whom did there appear the slightest sign to indicate that bad lymph had been used, and too the Assistant Superintendent for Kolábá said that he saw the child himself a day or so after it had been used as a vaccinifer, and that then there was nothing unusual in its appearance. Under these circumstances I think I was perfectly justified in exonerating the vaccinator, though the Assistant Collector, Mr. Johnson, who subsequently investigated the case, came to a different conclusion, and gave it as his opinion, that some arrangement had been come to between the father of the child and the vaccinator. Considering that the vaccinator was removed from the táluká, for obvious reasons, immediately after the occurrence was reported, I do not think any arrangement of this description was at all feasible, and with this remark I shall leave the subject at rest.

General progress.

15. In speaking of the general progress I propose taking in detail the different districts into which this Circle is divided, but before doing so it may not be out of place to give a short outline of the Circle entire. It extends from the confines of Damman northward to those of Goá in the south, being limited eastward by the range of the Ghâuts, and to the west by an extensive sea board some 250 miles or more in extent. It thus three parts confines Bombay, the only part of that city uncovered by it being its western aspect towards the sea. The result of this is a free radiation of small-pox infection from Bombay whenever it prevails there; and further a facility of importation of the same infection through the many ports dotting the large sea board by means of incoming foreign craft. The Collectorates comprised within this are, first, Thánà, with the Native State of Jawár; second, Kolábá, with the Native State of Janjírá; and, third, Ratnágirí, with the Native State of Sáwantwádí.

Thánà Collectorate.

16. In the Thánà Collectorate vaccination has retrogressed rather during the past year the number of persons treated being only 15,9[illegible], or some 1,515 less than the returns exhibited for the yea[illegible]1871-72. However paradoxical it may appear, the fact stands that in this district the places [illegible]ere progress and civilization are making greatest strides, vaccination evidently retrogrades, while in the wilder parts, where the people are ignorant in the extreme, it seems to be making steady and sure way. I can only account for this by stating that the people, as I have found them, are much more manageable in the latter places, and that they are more ready to accept any advice offered them. As instances of what I mean I may state that in the large towns such as Thánà, Kalián, Bhewndy, Bássein, Máhim, Dhánu, &c., &c., vaccination makes little way, and that little even only amongst the poorer portion of the population, while small-pox seems to have a permanent habitat amongst their crowded thoroughfares. The children of the well-to-do and supposed to be enlightened portion of the people, are seldom submitted to the vaccinator, and this, as I believe, is not from any want of faith in the prophylactic itself, but merely an indifference on the subject and a knowledge that there is no compulsion in the matter. It is my belief, and not alone mine but that of most of the officials I have conversed with on the subject, who have paid it any attention, that vaccination will never be efficiently carried out in these towns until made compulsory. Another fact I may state that I think has hindered the more general spread of vaccination in the past year was the prevalence of inocula-

tion in many of the tálukás. I have received reports of its being carried on in the Bhiwandí Táluká, in Máhim, in Sáshtí and some others, and as long as it is allowed to go on without some punitive deterrent, so long will it undoubtedly prevail. The district officials in the absence of any legal means to strengthen their hands are loathe to interfere, and I must say with good reason, for it would not be over-pleasant to find that on interposing their authority they found it set at defiance. A good case in point occurred in the Máhim Táluká, where the Assistant Superintendent for the Thánú Zilhá, Mr. Máhádeo Vináyak, brought to the notice of the Mámlatdár that a Kumbhár was inoculating in the táluká, and requested he might be restrained from doing so. The Mámlutdár stated he could not interfere, as the man was committing no crime, and, if he did so, he would be punished on being placed before him in the usual course. I have recently addressed Mr. Robertson, the Collector, on this subject, suggesting that some means might be devised to restrain these people from practising inoculation, and thereby spreading small-pox amongst the people. But, in the meantime, I would ask here if the time has not come when some legal prohibitive steps might be taken against it. The generally received opposition to doing so cannot be said to prevail here, as a glance at the returns will show that complete means of vaccination are decidedly within reach of the people, and while they are so, I think no hardship would be inflicted by enforcing the discontinuance of inoculation, which long-existing prejudice amongst many sections of the population induces them to prefer. These two causes, opposition and prevalence of inoculation, have mainly contributed to the hinderance of the spread of vaccination in the Thánú Collectorate, and I think, too, a general want of cordial support to the vaccinators from the district subordinates has aided them not a little.

Village Registers.

17. The keeping of the village registers in this Collectorate is not performed in such a way as to render them in very many instances of the least use. There are some exceptions I must say, but the generality of the taláthis make up their registers either by copying those of the vaccinators when so permitted, or taking down the names as subsequently given them from memory of the pátils. This latter process must of a necessity be defective, for in many of the táluká villages the pátils are a most ignorant and illiterate class of men, while the former defeats one of the chief objects of the village register, a check on the vaccinators' returns. I some time ago addressed the Collector on this subject, and endeavoured to point out the necessity of directing the taláthi's presence in the village during the vaccinator's visit. He agreed with me in deeming the taláthi's presence advisable, but did not think it possible to secure it on all occasions under the existing state of things. Some of the taláthis have as many as fifteen villages in their charge, and taking their many other duties in connection with them into account, he did not think their attendance during the vaccinator's visit always feasible. He, however, said he would order their presence when possible, so that I am in hopes a more efficient village register will be kept in the current year.

Jawár Native State.

18. In Jawár, vaccination has been making good progress during the year, the returns from which show an increase over 1871-72 of 656 persons treated, the total number for this year being 1,081. This number is, I think, capable of further extension, which I hope to see in the coming year, as there is yet a good deal of work in arrears to be performed. I noticed this in a recent visit to the State, as also the fact that the work had been hitherto entirely carried on in the two Mahals of Jawár and Dherjí, while that of Gunjár had been left altogether neglected. As far as I could ascertain, there is very little opposition on the part of the people of this State to vaccination, and any retrograde movement will be more attributable to want of energy on the part of the vaccinator than to any other cause. There is one thing, though, to be said, that the district is exceedingly unhealthy during the months immediately succeeding the monsoon, and at that time work is only carried on there with great danger to health. In fact, the same may be said of the northern and eastern tálukás

of the Thána Collectorate, viz., Dhánu, Sholápur, Wádá and Murbád, and those who are unacclimatised, as it were, cannot with impunity visit either district till after Christmas. There were no village registers kept, but I have communicated with the kharbhári on the subject, pointing out their use, &c., and he has promised to make an effort to have them kept, though I fear that will be matter of some difficulty, as there is only one talathi entertained for each Mahál.

Kolábá Collectorate.

19. In the Kolábá Collectorate there has been a falling off in the numbers treated this year to the extent of 1,791, which decrease has been extended over the tálukás of Rohá, Mahád and Mángáon. In the tálukás of Rohá and Mángáon vaccination has, I think, reached its limit, as there are little, if any, arrears to be cleared off. All such work in these two tálukás was got through by the present active Assistant Superintendent for Kolábá, Mr. Bálu Chálká, who when a vaccinator held charge of them, so that now the operations can scarcely exceed the birth rate. An application of mine to the Mámlutdár of Rohá, in the course of the year, for a return of unprotected children under 12 years, elicited the fact that there were but 150 such in the whole táluká; and the fact that in this táluká, alone, of the whole Circle, the number of the infantile operations exceeds that of childhood and adolescence, is, I think, strong proof of the absence of any arrears. Thus under the heading "under one year" the persons treated were 473 and "over one year" 405. Taking the whole Collectorate the figures under these two headings approximate very closely indeed—in fact, much more so than in any other district in this Circle; those under the former being as 40·9 per centum to the whole, and under the latter as 59·1. There is room yet for some improvement in the Máhád Táluká, in which there was a break of work in consequence of the vaccinator employed there receiving a month's privilege leave, to which long service entitled him. He reported to me, too, the presence of inoculation in his táluká, which was not, however, carried on here to any considerable extent, as, on the matter being brought to the notice of the Collector, steps were taken to prohibit it. The existence of a partial famine both in this and Mángáon tálukás, for a portion of the year, considerably interfered with the progress of work.

Janjírá Native State.

20. The returns received from this State during the year fully, I think, justify the predictions made in last year's report as to the progress vaccination may be expected to make. 1,364 persons have been treated, and were it not for some want of energy displayed for a few months of the year by the vaccinator I sent into the State, and also a deficiency of tact, the returns would show a little larger number. Some opposition was met with against the progress of vaccination, but this was overcome by Mr. Larcom, the Assistant Political Agent, whose interest in the subject the present satisfactory state of things may be entirely attributed. When I visited the State in February, I was unfortunately incapacitated for the performance of any out-door work by a serious attack of illness, but what I did see, fully satisfied me as to the interest awakened on behalf of vaccination, and gave me every reason to infer for it a still greater progress and spread. Some attempts were, I was informed, made to carry on, as heretofore, inoculation, but they were promptly stopped in accordance with a former prohibitory mandate issued by His Excellency the Nawáb.

Ratnágirí Collectorate.

21. In the Ratnágirí Collectorate a very large increase is shown in the number treated, as compared with returns furnished for 1871-72. In that year the total number was 32,934, while in this it is 37,182, giving an increase of 4,248. This increase is due to the presence of small-pox, notwithstanding the large number vaccinated, in part, and also I think more immediately to the energy of the men employed, interest in the spread of the prophylactic taken by all the district subordinates, and a ready appreciation of its benefits, pretty general amongst the people themselves. I was in the Collectorate for the greater part of the year 1872, and

without egotism I may be permitted to say that my presence contributed, somewhat, towards the attainment of this progress. Village registers have been kept here for the first time, and, considering the many difficulties attendant on their introduction, I have to report most favourably of them, in every case where I had to examine the villages in which they were kept. I do not think any inoculation has been carried on; but I may state with regard to this subject that I was forwarded, for perusal and comment, by the Collector, Mr. Elphinstone, a petition from a vakil of Dápulí requesting that some inoculators, on whom an embargo had been placed might be allowed to carry on their practice. I wrote to the Collector at some length, pointing out the danger attendant on such practice, and I have no doubt he has acted on my suggestions in returning the vakil his answer.

Sáwantwádi Native State.

22. In the Native State of Sáwantwádí vaccination is more universally practised than in any other district of this Circle. I visited the State in the month of May, and got then ocular proof of the very great progress it has made. This very satisfactory state of things may be attributed, in the first instance, to the interest taken in the subject by the Political Superintendent, who spared no pains to induce the general use of the operation, and now, I should say, from my own observation, to free acceptance of it by the people generally. The vaccinator meets with little or no opposition, and the result is, that instead of time being wasted in arguing away nonsensical prejudice, as often happens within the limit of British territory, it is all devoted to work. The number of persons treated during the year was 6,528 as against 4,648 during 1871-72, giving an increase of 1,880. The only fault I have to find with vaccination in this State is that the number of infantile operations forms so small a percentage of the whole; but here as elsewhere there is immense difficulty met with in trying to induce the people to submit their children for treatment during infancy.

Returns.

23. Examining the returns for the whole Circle, it will be found that of the total number of primary vaccinations, or rather of persons primarily vaccinated, viz., 65,934, 33,896, or 51·4 per centum, are males, and 32,038, or 48·6, are females, as against the percentages in 1871-72 of 51·7 and 48·3 respectively. Taking the different castes of the persons treated, the percentages they give to the whole are Christians ·9, Hindus 89·1, Musalmáns 4·2, Párs'ís ·2, and out-castes 5·6; while the percentages during the year 1871-72 were—Christians 1·9, Hindus 88·6, Musalmáns 2·9, Párs'ís ·002, and out-castes 6·5. Thus it will be seen that there is a lessening of the use of the operation amongst the Christians and out-castes, while there is an increase amongst the Hindus, Musalmáns and Párs'ís. Not being in possession of the relative proportions the different castes bear in the total population, I am unable to compute accurately the relative favour vaccination receives amongst them; but I would observe that the increase in the Musalmáns and Párs'ís is a good sign that the operation is being looked on with more favour by these sects. The legal prohibition of inoculation would, I believe, be the means of throwing into the hands of the vaccinators a great many more of the former sect than are at present to be found on the returns. They and the Kolí castes are by far the most intractable of the whole people we have to deal with, and in many cases I find a disposition on the part of the vaccinators to fight shy of them. Of the relative ages of the persons treated, it will be found that 15,119, or 23 per centum, were under one year, while 50,815, or 77 per centum, were over one year. In the year 1871-72 these percentages stood at 23·05 and 76·95, respectively, thus showing that this year, just closed, was a shade more unfavourable towards infantile operations than that preceding it. I make every effort myself, when making my inspections in the villages, to impress on the people the great advantage of submitting their children for treatment during infancy, and I also instruct the vaccinators, and Assistant Superintendents, to lose no opportunity of following in the some strain. But, notwithstanding the strong opinions I hold on the advantage of early vaccinations and every effort to carry them out, I have, I regret to say, made as yet but little progress, as the sequel shows, in inducing the people to

accept them. The only part of the Circle, as I said before in an earlier part of this report, where they are at all receiving a proportionate amount of favour is in Kolábá, where the work in arrears to be cleared off is comparatively little. Probably, too, the vaccinators themselves, finding a good deal of work to be done amongst children over one year, do not pay that amount of attention to the subject that I would have them.

Re-vaccinations.

24. The total number of re-vaccinations performed during the year was 3,878; of these 2,318 operations, or 66·8 per centum, were returned as successful. Most of these operations were performed in the Collectorate of Ratnágirí and the Native State of Sáwantwádí. In the former, the presence of small-pox acted as the chief incentive to their acceptance, and in the latter, I believe, they are mainly received on account of the personal interest taken in their performance by the vaccinator, Jayarám Kánojí. There is plenty of room for re-vaccinations in the Kolábá Zilhá, but as yet they do not make much way there, the people not realizing the necessity for them.

Small-pox.

25. Small-pox with more or less severity presented itself in nearly every district in the Circle during the year, and at the present moment prevails widely in the tálukás of Rájápur and Ratnágirí. In the former táluká I noticed its approach myself when travelling in May 1872 in that and the Deogarh tálukás. It was brought in some native boat from Bombay to Vijayádurg, and thence spread itself inland in spite of every effort to restrain it. This is only one port, however, and I merely mention it as I saw there, myself, how it had been brought. But what occurred there may have occurred at many other ports along the coast, and I have no doubt did so. I saw two boatmen in whom the eruption was then in the sealing stage, and they told me they had contracted the disease in Bombay, and brought it home with them. This they did to some effect, for at that time I saw three persons who were suffering from it. One a young woman of 17 or 18 years of age in whom it showed in the confluent form. I think I can safely say that the Ratnágirí Collectorate was free from the disease in an epidemic form until it was brought down to these different "bundars" from Bombay, and since then not one single táluká has escaped it. In the Tháná Collectorate it also prevailed; but here it is more or less *en permanence*, being kept alive by the inoculators. However, it got here also a good deal of additional force from the Bombay epidemic, as it did, too, in the Kolábá Zilhá. In fact, as may be gathered from the brief description I gave somewhat earlier of the position of this Circle with regard to Bombay, whenever small-pox at all prevails at the Presidency, I am pretty certain to be inundated with it, and no doubt as time offers I only, too, probably pay out the Presidency in kind.

Tour.

26. As Statement No. VII. gives a complete summary of how I was employed during the year, I do not think it will be necessary for me to lengthen out an already far too long report by giving any particulars here of my tour. I will only say that I visited during the year the Native State of Sáwantwádí and every táluká of Ratnágiri, all the tálukás of Kolábá and the Native State of Janjírá, and four tálukás of Tháná. I travelled 1,400 miles, visited 193 villages, and saw 5,752 vaccinated children, nearly all of whose names were called from the register. My inspection work was interrupted during the month of February, portion of which time I was employed specially, and the remainder I was unable to perform any out-door work in consequence of illness.

27. I noticed in last year's report the inadequacy of the number of peons allowed to the office, and then requested that they might be made up to their former strength, viz., four. Another year's experience has only confirmed me in the belief of the inadequacy of three men to perform the duties required of them efficiently, more especially during the travelling season; and I would, therefore, again beg to bring forward the subject in the hope that it may receive some consideration.

Camp Mallání, 17th May 1873.

NORTHERN CIRCLE.

Superintendent.—MANCHARJI BERAMJI COLA, M.D.

Establishment.—4 Assistant Superintendents, 1 Clerk, 1 Vaccinator under Government 27 under Local Funds, 8 under Municipalities, 14 under Native Chiefs, and 25 Dispensaries.

Population 3,595,919. Total cost Rs. 26,420-12-9. Average cost of each successful vaccination 5 annas and 2 pies.

Establishment.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those unknown from the Total.	
			Increase.	Decrease.		In Primary Vaccination.	In Revaccination.
Government... ...	1871-72.	18,629	.....	.....	16,741	90·9	82·6
	1872-73.	1,210	.....	17,419	1,068	91·2	72·2
Local Funds ...	1871-72.	32,196	.....	.....	29,143	95·4	79·4
	1872-73.	52,069	19,873	.....	47,477	95·9	74·9
Municipalities ...	1871-72.	10,411	.....	.....	8,316	95·6	88·6
	1872-73.	11,456	1,045	.....	10,075	96·2	78·9
Native States ...	1871-72.	18,782	.....	.....	17,279	96·3	76·7
	1872-73.	24,262	5,480	.....	21,981	94·6	81·4
Dispensaries	1871-72.	3,423	.....	.....	3,683	93·1	70·3
	1872-73.	4,741	1,313	.....	4,236	93·2	69·3

General Progress.

10. It affords me much satisfaction to submit this annual report of vaccination. The above summary of our labours indicates a satisfactory progress; there is a goodly increase in the number of operations, both primary and secondary, as well as a slight increase in the percentage of success. The total increase amounts to 10,292.

Total of Work.

2. Taking the work of all the establishments together, the total number of operations performed during the year is 94,238; of these 90,814 were primary vaccinations and 3,424 were re-vaccinations. The total number of successful operations is 84,837.

Percentages of success, age, and sex.

3. The following are the percentages of success, age, and sex :—

	Percentage of Success.	Percentage of Age.		Percentage of Sex.	
		Under 1 year.	Above 1 year.	Males.	Females.
Primary Vaccinations	95·4	55·1	44·9	52·6	47·4
Re-vaccinations...	76·7	...	...	...	...

Cost.

4. The total expenditure of the whole Circle, as shown by Statement No. III., is Rs. 26,420-12-9; the cost of each successful case, including dispensary vaccinations, is 4 annas and 11 pies.

Lymph.

5. As regards the quality of the lymph in use in this Circle, the work of 28 persons came under my personal observation. Judging from this, and from the reports of the Assistant Superintendents, it may be said that the lymph in use was good. Of the 28 persons whose work was inspected, the lymph of 18 was good, of 2 middling good, of 6 middling, and of 2 bad.

English Lymph.

6. Two supplies of English lymph were received from the Superintendent General The first, received in November, was tried in Veramgáon Táluká and failed; the second supply was used in Camp Disá, and was only partially successful.

Dengue Fever in Gujarath.

7. From April up to December 1872 a severe epidemic of dengue fever prevailed in all parts of this Circle, and it was the cause of more than the usual amount of sickness among our vaccinators. Owing to this, there were incessant breaks in work in different parts of the Circle, and the difficulties of resuming work were great. Among the village population, also, the fever was so very prevalent that our vaccinators found great difficulty in getting children for vaccination. But for the prevalence of this fever, incapacitating both the vaccinators and those to be vaccinated, there would have been a larger increase in this year's work.

Changes among Vaccinators.

8. When my last report was submitted, there were three vacancies on the establishment unfilled on account of the difficulty I experienced in getting trustworthy men. During the year all these have been filled up. In Bánsdá no work was performed from April up to August, in which month Balwantráo Gopál, the late vaccinator of Rádhanpur, was employed to fill the vacancy. Considering that, since his arrival in Bánsdá, this vaccinator has been on and off ill, his work (1,457 operations) is satisfactory. The Dholká municipal vaccinatorship was filled up by the end of October, and I regret to observe that Lallú Jádhao, who was selected for the post, has turned out in many respects an unfit man. The third vacancy, that of Umreth in Khedá Zilhá, has been, as a temporary measure, filled up only within the last month of the year under report. Three vacancies occurred during the year. Premsing Gangásing, municipal vaccinator of Veramgáon, was dismissed for falsifying his returns, and his place was filled up by Pírkhán Mahmadkhán in May, but after a few months' work Pírkhán died of fever in October; and his place was filled up in November by Narbhirám Tápishankar. Ha-

richand Bháskarjí, 2nd grade Local Fund vaccinator of Dhandúká, retired from service from 1st January 1873 on account of continued ill health. Arrangements for filling up his place are under consideration.

Conduct of Vaccinators, &c.

9. The conduct of the vaccinators, as regards their behaviour with the people of their tálukás, has been very good; not a single complaint of any kind has come to my knowledge. But as regards their zeal in keeping up work, I had to find fault with several of the Local Funds' and Native States' men, and had to inflict fines. Of these two men still continue extremely indifferent to work, viz., Govindráo Bálájí and Jivarám Chaturbhuj, both of Mahí Kánthá. Though their pay has been reduced from Rs. 20 to Rs. 14 since December 1871, they have not improved at all in work, and I have already, whilst on inspection in their tálukás, given them notice of dismissal in case they did not improve.

Small-pox.

10. A somewhat wide-spread epidemic of small-pox broke out in the northern part of this Circle in the last quarter (January, February, and March) of the year under report. Though I was apprised of the breaking out of the disease about the middle of January, yet, from inquiries subsequently made, I have reason to believe that it first made its appearance about the middle of December 1872. It broke out here and there in nearly all tálukás of Khedá Zilhá, but with considerable force in the Kasbá towns of Kapatbanj, Nariád, Dákor, Mahudhá and Borsad. In Ahmadábád Zilhá it occurred in three outlying villages (Osmánábád, Khoriád and Sábáspur) of Daskroí Táluká and in one or two villages of Dhandúká, Gogo and Prántej Tálukás only, as well as in the city of Ahmadábád. From Mahí Kánthá reports of the appearance of the disease were received from Idar, Pethápur and Mágodí by the end of March. Súrat and Broach Zilhás have remained free from the disease, though in the cities of Súrat and Broach the occurrence of a few cases bas been reported.

11. The outbreak of the disease was sudden, and it made its first appearance with considerable virulence in Nariád and Kapatbanj towns. When I received a report of this, I was very far off in Disa, and unable to reach the infected locality in time to be of any use; but arrangements were made to check the prevalence of the disease, and all the active work of carrying out my instructions fell upon the Assistant Superintendent of the Zilhá, Mr. Parbhádás Hírjí, who in conjunction with the hospital assistant and the táluká vaccinator checked the disease in a very short time. He carried out my general instructions in other places besides Kapatbanj, and succeeded in checking the disease in the infected localities as they were brought to his notice. Under my instructions, also, he made nominal returns of small-pox cases that occurred in the places he visited, showing—1st and 2nd, the age and caste of the affected persons; 3rd, the result of the cases whether ending in recovery or death; and, 4th, whether they were previously vaccinated or not. These returns must have been a work of no little labour to him. It gives me great pleasure to state here that, during this critical period, Mr. Parbhúdás worked with commendable zeal and industry; and though other Assistant Superintendents would, I doubt not, have done the same, I would beg to bring Mr. Purbhudas's work of these three months to your notice thathe may receive commendable mention.

12. As stated above, I was not able to reach the infected localities at the time the epidemic broke out, but by the end of March I arrived at Kapatbanj to make special inquiries regarding the small-pox that prevailed there, and subsequently I visited the other places where it had prevailed. In addition to the nominal returns of small-pox cases received from the Assistant Superintendent, I called for authentic death returns of small-pox from the several Mámlatdárs of Khedá Zilhá; and my mornings are now chiefly devoted to verifying or correcting these returns by a personal visit to such of the villages as are reported to have specially suffered from it. I have two principal objects in view in undertaking these in-

quiries, viz., (1) to ascertain to what extent small-pox has affected those who were previously vaccinated, and (2) to ascertain the cause of so many cases remaining unvaccinated. The result of my inquiries, together with a compilation of the returns, shall form the subject of a special report.

Precautionary Measures.

13. In case the disease travelled southwards, the vaccinators and the Assistant Superintendents of Súrat and Broach Zilhás were cautioned to be active and to be on the look out for the appearance of the disease in their charges. In the cities of Súrat and Broach I had "battakis" beaten in all parts of the town, informing the people of the appearance of the disease in other parts of Gujráth, and calling upon them to have all their unprotected children submitted for vaccination.

Punishment of Inoculators in Dharmpur.

14. Dharmpur and Bánsdá were in former years the breeding grounds of inoculators; the introduction of vaccination in them is, however, producing good results. During the year under report, 3,667 operations were performed. With the progress of vaccination, inoculation is being weeded out. About the commencement of the year the Dharmpur vaccinator reported of inoculation having been carried on, in some villages, by a certain person whom he was able to trace. This report was submitted to the Agent, for transmission to the Darbár, with a request that steps might be taken for the suppression of this disgusting work. The result of this reference was very encouraging, and Mr. Shaw Stewart wrote as follows in reply:—"The Dharmpur Rájá has written to me to say that he has punished two persons who practised inoculation; one of these was caught by the vaccinator and the other by the Faujadár; they have both been sentenced to one month's rigorous imprisonment, and to pay a fine of Rs. 25, or, in default, to suffer three months' further imprisonment. The Rájá further says that he has made arrangements to look after such persons in future." This was very satisfactory, and if the vaccinators continue to do good work, and at the same time keep a vigilant eye upon inoculators, with such a deterrent punishment as the above, inoculation will cease altogether. The action taken by the Darbár was so prompt and decisive that I think it deserves to be brought prominently to the notice of Government.

Dispensary Vaccination.

15. Compared with last year's results the dispensary returns show an increase in the amount of work, as also in the percentage of success, and this would lead one to suppose that the state of vaccination at dispensaries was satisfactory. It is necessary, however, to take into consideration the returns of each dispensary separately, and to look to the monthly work of each. Several returns show an average of eight operations per month—that is, two operations at a sitting. As a consequence of this, there are frequent breaks and frequent applications for supplies of lymph. Excluding municipal towns there are 21 dispensary towns having an aggregate population of 219,631 souls, who are left to the care of dispensary officers for protection by vaccination. Since the paying system is introduced in dispensaries, there are, I believe, so few cases coming for treatment that every dispensary officer can now command ample time to devote to vaccination. But I have noticed that there is still much apathy in them to do this work; and, considering that there is a similar or even greater amount of indifference among people of the larger towns, it is no wonder that a large number of children remain unvaccinated, and fall victims to small-pox during epidemic seasons, as was the case in this Circle during the closing months of the year under report.

Native States' Vaccine Establishments.

16. The reorganization scheme of the vaccine establishments of Pálanpur and Máhí Kánthá States, of which mention was made in previous reports, is still under the consideration of the Political Officers. Though nothing, officially, has been communicated to me, yet I believe in the Pálanpur Superintendency the chief difficulty lies in obtaining the co-

sent of the Rádhanpur and Pálanpur Darbárs. During my late travels through the Superintendency I availed myself of an opportunity of calling upon Colonel Phayre, the Political Superintendent, and begged him to give his support. I was promised that the subject would receive his best attention, but soon after my interview he left the Superintendency to take charge of the Barodá Residency. As regards Mahí Kánthá, by date the 27th July 1872, Major P. H. LeGeyt, the Acting Political Agent, informed me that at present he was unable "to obtain from the Chiefs of Mahí Kánthá the increased amount of subscription" required; adding that, after making the personal acquaintance of the Chiefs, he hoped to be "able to effect more towards the desired end." On account of this hopeful reply I was desirous of meeting Major LeGeyt whilst on my tour through the Mahí Kánthá, but I did not succeed in getting an opportunity of so doing. To have met with the approval of the Political Officers is, I consider, a gain on the side of success, and I hope that the scheme may ultimately receive the consent of the several Darbárs and Thákur Chiefs.

Tour.

17. In the beginning of the year I was encamped in Broach. The two months and a half (April, May and half of June) of that fair season were spent in the inspection of Broach and Ankleshwar tálukás of Broach Zilhá and of Ulpád, Mándví, Bárdolí, Chikhlí and Jálalpur tálukás of Súrat Zilhá. The dispensary vaccinations of Ankleshwar, Eláo and Mándví were inspected. I was pleased to find Mr. Lakshuman Anant of Eláo doing good work; of the amount of pains taken by the other two dispensary officers on vaccination I may simply state that it was *nil*. I was out on district work again in November, and nearly the whole of the present fair season has been devoted to the inspection of the vaccinators' work of the Pálanpur Superintendency and Mahí Kánthá Agency; and though everything was not found quite satisfactory, yet the state of vaccination was better than what I had observed on my previous inspection of the States. During the whole tour I examined in all, including dispensaries, the work of 28 vaccinators, 13,640 children were inspected, my travelling extended over 2,054 miles, and 414 villages have been visited.

Camp Umreth, Khedá District,
23rd April 1873.

SINDH CIRCLE.

Superintendent.—Assistant Surgeon J. WILLIAMS, M.D.

Establishment.—4 Assistant Superintendents, 1 Clerk, 43 Vaccinators under Local Funds, 1 under Native Chiefs, and 21 Dispensaries.

Population 2,179,671. Total cost, Rs. 31,728-0-4. Average cost of each successful vaccination, 7 annas and 2 pies.

Establishment.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those unknown from the Total.	
			Increase.	Decrease.		In Primary Vaccination.	In Revaccination.
Government	1871-72	13,905	.....	.....	13,005	99·3	51·8
	1872-73	288	.....	13,617	276	100·	100·
Local Funds	1871-72	53,110	.....	.....	50,434	98·2	71·5
	1872-73	65,402	12,292	.....	62,287	97·9	73·6
Municipalities.....	1871-72	7,976	.....	.....	7,001	93·6	80·2
	1872-73	8,228	252	.....	7,145	94·6	61·3
Native State	1871-72	2,180	.....	.....	1,770	81·1	...
	1872-73	1,941	.....	239	1,486	79·1	...
Dispensaries	1871-72	2,099	.....	.....	1,811	92·4	59·6
	1872-73	2,455	356	.....	2,194	93·7	72·7

As compared with the year 1871-72 there has been a decrease in the number of persons vaccinated of 956. The large decrease of 13,617 in the Government Establishment is due to the vaccinators having been transferred to the Local Fund Establishment, one vaccinator having been in receipt of pay from Government for a couple of months only. There is a decrease of 239 shown by the returns of the Native State vaccinator. I should not have been sorry if his return could have been omitted altogether, for I have reason to believe he has been falsifying largely. His case is under investigation.

Decrease.

2. There is an increase shown by the Local Fund Establishment of 12,292, accounted for by an increase in the number of vaccinators; by the municipal vaccinators of 252 owing chiefly to a large number of vaccinations at Karáchí, which includes those performed at the Jail under Dr. MacDougall. It appears from Dr. MacDougall's report that the vaccinator under his charge per-

Increase

forms a large number of operations in European regiments which are not included in his returns.

The increase of 356 vaccinations at dispensaries is due chiefly to the addition of Guadar to the list.

Collectorates.

3. Taking the several Collectorates, Karáchí shows a decrease of 3,872, Shikárpur 702, Haidarábád 619; whilst Jacobábád has an increase of 719, and the Thar and Párkar 3,472.

The large decrease in the Karáchí Collectorate is not so unsatisfactory as at first sight it appears to be, for it occurs entirely in the column for children above one year of age.

4. There was a considerable falling off in the quantity of work done from August to December, owing, apparently, to the great prevalence of sickness consequent upon an unusually heavy rainfall.

Strength of Establishment.

5. During the year the establishment was brought up to the strength proposed by Dr. Pinkerton. So that there are four Assistant Superintendents* and forty-three vaccinators paid out of Local Funds, and five vaccinators paid out by Municipalities, viz. two at Karáchí, one at Haidarábád and one at Shikárpur. The Kotrí municipal vaccinator was dismissed last year, and it was deemed unnecessary to replace him, as his work would be performed by the táluká vaccinator.

Expenditure.

6. There has been a considerable increase in the expense, viz., Rs. 5,069-3-8 due to the increase in the establishment.

Sex.

7. There were 41,430 males and 32,054 females against 41,579 males and 32,153 females (primary vaccinations) in 1871-72.

The proportion is just the same in both years, viz. 56·3 males to 43·7 females in 1871-72 and 56·4 males to 43·6 females in 1872-73.

8. According to the dispensary returns the proportion of males to females is 1,451—992 in 1872-73, and 1,170—807 in 1871-72, or a percentage of 59·4 males and 40·6 females (or nearly 3 to 2) in 1872-73, and 59·2 males and 40·8 females in 1871-72. So that on comparing the proportion of males to females in the tálukás and in the dispensary towns, in the latter the males predominate to the extent of 3 per cent.

Caste.

Year.	Christians.	Hindus.	Musalmans.	Pársís.	Other Caste.
1871-72	·19	15·39	76·55	·05	7·81
1872-73	·18	14·58	76·32	·12	8·77

The increase in the column "Other Castes" is due to the increased number of vaccinations in the Thar and Párkar Districts.

10. In the dispensary towns the proportion of Hindús to Musalmáns is much higher. In 1871-72 there were 1,043 Hindús to 915 Musalmáns. In 1872-73 there were 1,114 Hindús to 1,307 Musalmáns. The difference in the proportions of the two years is caused by the vaccination as Guádar, where the population is chiefly Musalmán.

* Paid by Government—P. S. T.

11. With regard to age the year 1872-73 shows an improvement, inasmuch as the proportion of children vaccinated under one year of age is greater than in the previous year—the numbers being in 1871-72, 28,626 under and 45,106 above one year; in 1872-73, 32,098 under and 41,386 above one year; or per cent. 38·8 under and 61·2 above one year in 1871-72, and 43·6 under and 56·4 above one year in 1872-73.

Age.

12. With reference to the remarks made by Dr. Turnbull in para. 14 of the Superintendent General's Report on Vaccination for 1871-72, it is impossible to give correct data for calculating the probable number of children that might be vaccinated annually until the census returns are furnished, and something like accurate registration of births and deaths be carried out. In the province the total number of persons vaccinated annually will probably vary a good deal according to whether many or few come from foreign territories to be vaccinated.

Population.

13. In primary vaccination the degree of success is 97·2 per cent.; in re-vaccination 69·3. The success in re-vaccination ranges from 100 to 28·9 per cent. This is due, I believe, to a difference of opinion amongst vaccinators as to what constitutes a successful re-vaccination. One will consider a case successful, no matter how far modified, so long as a vesicle appears; another will enter a case as "unsuccessful or doubtful" unless it runs a course similar to that of a primary vaccination. Re-vaccination after small-pox, inoculation with small-pox virus, and vaccination show a very similar degree of success. Re-vaccination is not yet popular, but I hope that in a few years people will accept it as readily as they do "primary" vacccination.

Percentage of Success.

14. On the subject of re-vaccination I transcribe remarks made by Honorary Assistant Surgeon Leahy, M.R.C.S., of Sakkhar—

"With a few exceptions the whole of these cases were Patháns, who, becoming alarmed at the death of one of their number from small-pox, came of their own accord to the dispensary to be vaccinated. Many of them had previously been inoculated (on the wrist), and a few bore marks of having had small-pox. The percentage of success was 83·33. The year before last an attempt was made to induce the people of Sakkhar to undergo re-vaccination. A few submitted, but the feeling against the measure was so strong that on the advice of Major Wallace, then Collector of the district, whom I consulted on the matter, I gave it up. Major Wallace was of opinion that preseverance in trying to introduce re-vaccination would probably arouse a spirit of opposition to primary vaccination. It struck me at the time that it was of very little use to endeavour to push re-vaccination among male adults or boys, seeing that it was hopeless to expect the female portion of the community to submit to the operation."

15. This year there are 21 dispensaries on the list, against 19 in the previous year. The two additional dispensaries are those of Manorá and Goádar. They show a total number of 2,455 persons vaccinated against 2,099 in 1871-72. There is usually no expense connected with vaccination performed at dispensaries in Sind, beyond, perhaps, a rupee a year for vaccinifers from the táluká. But at Ládkháná and Rohrí there is an allowance given for vaccinating. In the former the total cost was Rs. 14-4-0 and in the latter Rs. 192, the payments including peons' salaries. Judging by the number vaccinated, these payments have a good effect in stimulating those in charge of the dispensaries to work at vaccination.

Dispensaries.

Almost all complain of great difficulty in obtaining subjects for vaccination, owing to the objections of the Hindús on religious grounds. But the Mukhtiárkárs seem to have very considerable influence over the people, and I think that obstruction by the people means very often a want of active sympathy with vaccination on the part of Mukhtiárkárs.

16. The Musalmáns as a rule accept vaccination most readily, but in the larger towns the Hindus predominate, or at least in much larger proportion than in the district; hence the reason that officers in charge of dispensaries have greater difficulties to contend with than the táluká vaccinators.

Goádar.

17. This is the first year that we have received returns from Goádar. The population is given at 6,000, chiefly Musalmán. There were 326 persons vaccinated, of whom 73 were under and 232 above one year of age; 186 males and 139 females; 2 Christians, 62 Hindús, and 261 Musalmáns; 253 were successfully vaccinated, 52 unsuccessful, and in 20 the result was not known. The total cost has been Rs. 63-12-0 out of a sanctioned allowance of Rs. 150, and the cost of each successful case 4 annas.

18. It has been found very difficult to establish vaccination at Goádar. Repeated trials with tube lymph failed. A vaccinifer was taken from Karáchí in April 1872, and vaccination was established, but unfortunately in the month of May the lymph was lost. Repeated attempts with tube lymph failed till the month of January, when a few vesicles were produced and vaccination again established. Mr. Menezes, Assistant Apothecary, attributes this difficulty in establishing vaccination to the "constitutional inaptitude of the Goádar people, who are so cachectic and wasted that inactive lymph acts on them with great difficulty." Even it appears that small-pox contagion is not easily taken by the natives, and when taken, it is of the mildest form. There were fifteen cases of small-pox—all variola discreta, but no deaths." He has also "often observed that in emaciated children the vesicles did not appear on the 5th day as usual, but on the 9th or 10th day after the operation."

Quality of Lymph.

19. My predecessor Dr. Keith in his report on vaccination for eight months from April to November 1872 says that he considers the "quality of lymph to be all that can be desired. 2. That animal vaccination was not carried out during the hot season. 3. That no inoculation was reported up to November. 4. That reports of small-pox received from Mukhtiárkárs are unreliable. 5. That the vaccinators do very good work. 6. That the returns he examined during the hot season were all correct as far as he could make out, with the exception of those of the Vaccinator of Sháhábandar, who has since been dismissed. That he has seen no mark of syphilis arising from vaccination. 7. That the system of Assistant Superintendents is very good indeed." I can fully endorse Dr. Keith's opinion of the quality of the lymph.

English Lymph.

20. Two supplies were received: one was tried at Shikárpur under the supervision of Dr. Keith, who did not consider it sufficiently good for propagation. The second supply was tried by Assistant Superintendent Asumal, who reported favourably of it, and sent tubes filled with this lymph to the vaccinators of the Haidarábád Collectorate.

Animal Vaccination.

21. Animal vaccination has been carried on since January by Mr. Leahy at Sakkhar. I cannot do better than transcribe his report:—"Animal vaccination was resumed on the 20th January last, and has since been in successful operation. It has now been practised for three successive years, and the results show that there is no difficulty, so far as the operation itself is concerned, in carrying it out in the cold season, but that as soon as the hot weather sets in, the pustules produced by the inoculation of the calf are not so well formed, and a larger proportion of the punctures fail altogether than in the cold season. The calves used belong to people in the town, to whom they are returned immediately after the operation. On the sixth day following they are brought back to the dispensary for inspection, and to supply lymph for the inoculation of other calves, or for the vaccination of other children. At first two calves were used each time, but finding that we always succeeded, and fearing that a supply of calves of a suitable age would fail, I have latterly used one only. The Mahomedans offer no ob-

jection to the inoculation of their calves, but the Hindús (Banias) are opposed to the operation, and there is often much difficulty in persuading them to lend their calves for the purpose. This is unfortunate, as the greater number of calves in the town belong to Baniás, who also take more care of their animals than the Mahomedans. It would be more satisfactory if the calves could be kept at the dispensary, but there is no shed or other place available wherein they could be secured, and, moreover, they are generally too young to be separated from their mothers.

"Last year the town punchayet, which consists entirely of Hindús, called upon me and begged that I would not go on with animal vaccination. In the first place they objected to the pain inflicted on the calves, and they also disapproved of their children being vaccinated with lymph taken from calves. I talked over the matter with them, and promised that I would not use their calves when others are procurable, and that their children would only be vaccinated with lymph taken from other children.

"The operation, as now conducted, involves very little expense, the cost being about one anna for each calf."

Inoculation of Small-pox.

22. It was reported that an inoculator was at work in the táluká of Rohrí, in the month of January, and on making further inquiry, through the Mukhtiárkár, I was told that he had escaped to Khálat.

Small-pox.

23. Through the kindness of the Commissioner in Sindh I am furnished regularly with the Births' and Deaths' Reports of the several Collectorates There have been but few deaths from small-pox within the past year, though many have been reported. This is owing to deaths from measles being returned as small-pox. I have lately shown in a letter to the Commissioner in Sindh why deaths from measles are invariably returned as deaths from small-pox; and the reason is this, that the column headed in English "Small-pox" is in "Sindhí" headed Sitlá, which include all the exanthematous diseases instead of "Vadhí Máiá," which means small-pox and nothing else. Sir William Merewether has taken measures to correct this.

24. Small-pox was more or less prevalent in Ketí Bandar and neighbourhood throughout the year, but I hope it will soon be extinguished. There have been a few cases at Táttá and at Karáchí, and more lately in Jacobábád and the tálukás bordering on Khílát, where small-pox has been and, I believe, is very prevalent. I do not think there have been 20 deaths from small-pox in Sindh throughout the year. This speaks volumes for vaccination when compared with the thousands of deaths from small-pox that occurred, almost annually, before the introduction of vaccination, and when it is considered that Sindh is exposed on every side to invasion by small-pox. This year the disease was brought to Ketí and Karáchí from Kutch and Bombay, and to Upper Sindh from Khílát.

Infection by Syphilis.

25. I have not seen nor heard of a single case of infection by syphilis or any other disease. The greatest care is taken in the selection of vaccinifers, for whom there is special column in the register.

Village Registers.

26. These have not yet been introduced into Sindh, nor is their introduction practicable into the villages as at present constituted, excepting perhaps in the case of municipal towns. In Sindh there are no responsible village officers, and consequently no one to fill in the registers.

We have the "Pátil" and the "Mukhí" as the head respectively of the Hindú and Musalmán community, but, in the majority of cases, neither the one nor the other can read or write. I think the introduction of the register very desirable for the purposes mention-

ed in para. 43 of the Superintendent General's report on vaccination for 1871-72, particularly " (b) countenance to vaccination, and assistance to vaccinators, by village officials, &c.;" "(c) permanency of the record for future use." Beside this register should be kept the register of births and deaths in each village, so that any unprotected children might readily be found.

I believe the whole subject is under consideration by the Commissioner in Sindh, and am almost certain that Sir William Merewether will devise some plan to introduce a village register ; but it must be a work of some time to get it into operation over the whole of Sindh.

Vaccinators.

27. Speaking generally, their conduct has been very good, and the returns in all instances found correct, except those of three junior vaccinators, who have been dismissed (one of the three was dismissed in April 1873). My predecessor, Dr. Keith, produced in the vaccinators a wholesome dread against levying " Murád" ; and though some of the Deputy Collectors, from whom Dr. Keith requested information on this subject, thought that " Murád" was occasionally levied, they did not cite a single instance of its being practised. Every vaccinator knows that he is liable to be dismissed if he levy " Murád," or take money, under any pretence whatever, from the people.

Assistant Superintendents.

28. The case of Mr. Hásá Mal, mentioned by Dr. Keith in his report for 1871-72, was ultimately referred to the Inspector-General, Indian Medical Department, who directed that Hásá Mal should return to duty ; and I must say he has worked splendidly. A'sú Mal has worked steadily. Lachman has not had the experience of the two former ; he, therefore, requires to be directed more constantly. Lál Baksh was appointed to replace Mehar Chand on 1st of September 1872. From what I personally know and have seen of him since his appointment I believe he will make an excellent Assistant.

Tour.

29. During the hot and rainy season Dr. Keith inspected the work of the vaccinators in the tálukás of Karáchí, Táttá, Kotrí and Haidarábád, sometimes along the hill range, at others near the sea. In September he proceeded to Upper Sindh, and saw work in the tálukás of Sakkhar, Shikárpur and Naushahrá. At the end of November I took charge, and went across the Collectorate of Haidarábád to the Thar and Párkar Districts, and inspected the work of the vaccinators in the tálukás of Haidarábád, Há'á, Alihar-jo-Tándo, Mírpur Khás, Kiprá, Umarkot, Díplá, Mirpurtí, Nagar Párkar and Cháchrá. When in the latter táluká, finding myself close to the border of the Jodpur Native State, I went over to see one of the villages, and found there had never been any vaccination carried on ; the few children whose arms bore the marks of vaccination had been vaccinated in Sindh. Fortunately there had been no small-pox in the district for fourteen years, but should it be introduced amongst them there will be a fearful number of deaths from small-pox. I presume that the other Native States on the east border of Sindh are equally unprotected against small-pox. Cannot the rulers of those States be induced to appoint vaccinators to protect their subjects against small-pox ?

Returning from Cháchrá I was met by Dr. Turnbull, Acting Superintendent General, at Umarkot. We travelled together as far as Haidarábád and Kotrí. I then made another tour through the south of Haidarábád, the Tándá and the Sháhábandar District.

Office.

30. I think I ought to mention that there is considerably too much work to be accomplished by one clerk. I would suggest that a Munshí be appointed to carry on the vernacular work. My time is now much occupied in doing work that should be done by the clerk whose time is large-

ly taken up by vernacular correspondence, &c., whilst the more important duties of superintending and supervising have, to a similar extent, to be neglected, or, at least, are very imperfect y done.*

I would also point out that the number of peons now attached to my office is quite insufficient for carrying on my work efficiently. Formerly I had a havaldár and four peons (one of whom was paid out of Local Funds); now there are only the havaldár and two peons, and for collecting children for inspection this number is quite inadequate. I would, therefore, suggest that two more peons be added to the establishment, at least during the travelling season.*

Thanks to Authorities.

31. I have again to acknowledge the material assistance I have received from the Commissioner, Sir William Merewether, and all the District Officers.

My thanks also are due to Colonel Dunsterville, particularly as Political Agent of Khairpur; to Colonel Phillips, Collector of Haidarábád; and to Colonel Tyrwhitt, Political Superintendent of the Thar and Párkar Districts. For personal assistance I am much indebted to Major Boulton, Captain Mayhew, and Mr. Tyndall. I am also under great obligation to Dr. Miller, Deputy Inspector General of Hospitals in Sindh, for his constant advice and assistance in connection with vaccination at dispensaries.

Karáchí, June 23rd, 1873.

* A second clerk and an additional peon for each Circle has since been sanctioned by Government in their Resolution No. 2783 of 7th August 1873.

KA'THIA'WA'D CIRCLE.

Superintendent.—Surgeon E. R. BUTLER, M.D.

Acting Superintendent.—Surgeon H. J. BLANC, M.D.

Acting Superintendent.—Surgeon E. SEXTON, M. D.

Establishment.—2 Assistant Superintendents, 1 Clerk, 1 Station Vaccinator under Government, 32 Vaccinators paid by Native Chiefs, and 3 Dispensaries.

Population.—1,782,062. Total cost Rs. 18,960-0-7.

Average cost of each successful vaccination, 4 annas and 4 pies.

Establishment.	Year.	Total vaccinated.	Compared with the preceding year		Successfully vaccinated.	Percentage of success, excluding those unknown from the total.	
			Increase.	Decrease.		In Primary Vaccination	In Revaccination.
Government ...	1871-72	4,690	.....	.....	4,315	94·6	71·0
	1872-73	1,967	.....	2,723	1,681	89·1	64·4
Native Chiefs ...	1871-72	64,756	.....	.....	61,378	96·8	81·8
	18727 3	73,601	8,845	.....	68,231	96·2	73·9
Dispensaries ...	1871-72	246	.....	.....	234	97·5	25·0
	1872-73	57	.....	189	52	98·1	...

I received charge from Dr. Sexton on June 19th, 1872, Dr. Blanc having been in charge during April and May.

Progress.

The progress of vaccination in Káthiáwád, judging by the grand total, in comparison with other years, has been satisfactory.

There has been, certainly, on the part of the people generally, a greater demand for vaccination. I have had numerous letters from many tálukás complaining that the vaccinator had not visited or vaccinated the children for months, and requesting he might be sent at once.

2. The increase in the number of vaccinations performed by the itinerant establishment is considerable, as may be seen by glancing at the above table, altogether amounting to 6,122.

Increase.

I do not consider, as stated by Dr. Blanc in his last report, that this increase is due *entirely* to a better distribution of men, and to more effective supervision, but I do think that the regular pay of the vaccinators has something to do with this increase, for in former years the vaccinators were very often without pay for a year ; but, then, on the other hand, before this new distribution, they were supplied with a pony, and they and their ponies were always fed and lodged; and in tálukás like Bháwanagar, where they were regularly paid, I consider they were much better off then than they are now.

3. Dr. Blanc's new distribution of vaccinators did not commence till August, so that for four months of the year the establishment was working on the old plan, and in the early months of the year there was an increase. Indeed, the increase in those four months was in greater proportion than the increase in the last eight months.

If the same rate had continued throughout the year, the total would have been 70,000, whereas the total was 69,446 according to Dr. Blanc's returns : and if the time of the year is taken into consideration, viz., April, May, June and July, the hottest months of the year, in which less work is done than in the other seasons, I think, I may safely conclude, that the total would have certainly been more with the old than with the new system. Positively so if the old system had provided 2 Assistant Superintendents.

Work performed in 1871-72.

	Old System.	New System.
	Total 4 months.	Average total of 4 months.
April	23,333	23,056
May		
June		
July		
August	New system total, 8 months, 46,113	
September		
October		
November		
December		
January		
February		
March		

My own impression of the real cause of increase is, that the people take more kindly to vaccination, and place less difficulties in the way, and also that the Darbárs earnestly strive to help the spread of vaccination, because they know it is the wish of the Sarkár, and, lastly, to the impetus given by the Assistant Superintendents.

4. Vaccination in Káthiáwád is of very few years' growth. Dr. Lord started it two or three years before I took over charge, and from the year 1864 up to the present time there has been a yearly increase of from 3,699 to 9,671 till 1871-72, when the total culminated in an increase of 11,680 ; but as I shall show farther on (under heading False Entries) and as Dr. Turnbull has already pointed out, that this increase was partly due to false entries.

5. There is very little to be said on this head ; there being only one Government vaccinator now. For part of the year 1871-72 there were nine. The number vaccinated by this man is 1,967, a very fair quantity, and very nearly equal to the average.

Decrease by Government Establishment.

6. Re-vaccination is urged upon the people, but with very little success, except in the station of Rájkot and among the Government servants.

Re-vaccination.

The total number for 1871-72 was 1,606 ; for 1872-73 it is only 818, showing a falling off of 788.

Percentage of Success.

7. The percentage of successful cases reported by the Chiefs' vaccinators is a decimal lower than last year, when it was 96·4. This percentage is much too high, as far as I can judge from what I saw during my inspection tour. The reason of Government Vaccinator Motílál's percentage of success being so small, is on account of the large proportion of re-vaccination cases in his return. His percentage of success in primary cases is 89·1, and I consider this to be about the true average for the whole Circle. Motílál's percentage of successful cases for re-vaccination is only 64·4. This is to be expected, as a great many of these were sepoys, prisoners in the jail, and others who showed good marks of previous protection.

Lymph.

8. Lymph was reported " bad " five times and once " indifferent" by the Assistant Superintendents. All these reports were made in the hot months ; the rest of the year it was reported on favourably. During my tour I found the lymph on the whole good, but the vesicles generally small.

English Lymph.

9. The English lymph the Superintendent General sent me, turned out extremely well : the children I vaccinated from it myself exhibited the largest and clearest vesicles I have seen, without an areola of inflammation, and caused no distress, and very little itching, to the children. I myself carried children, vaccinated with this new lymph, into three tálukás, and gave orders to the surrounding vaccinators to obtain a supply from the same source. The lymph is generally propagated from arm to arm, but sometimes, where a child is not available, from tubes filled with lymph from the nearest good supply.

10. I noticed a curious result in the effect of the lymph preserved in tubes, *i.e.*, that the lymph when drawn from the tube did not seem to be all equally efficacious : the lymph that came out first and last was generally inert, the centre part produced good vesicles. Whether this is owing to deterioration produced by the process of securing the ends of the tubes, or whether the true vesicle germ has a tendency to centralise, I cannot say ; but it may explain why lymph is often unsuccessful, and also opens a field for the microscopist.

Inoculation.

11. Numerous cases of inoculation came to my notice on tour, but they were none under three years. These cases all occurred on the borders of the Gáíkawád's dominions, and although I tried my best to find out the man, I could not trace him. At Káróngá they told me he lived at Gorgat ; I went to Gorgat, there they told me he lived at Gangá ; at Gangá they said he lived at Khambáliá. I have been encamped for four days at Khambáliá and cannot trace him. *My own impression is, that he was some itinerant holy man, earning a few pence by this means, for I found that he had generally been paid.* In one gaum they told me a woman had inoculated the children. The cicatrices were all on the styloid process of the radius.

Small-pox.

12. Small-pox has been very prevalent throughout the whole of Káthiáwád, and in the Mangarul Táluká assumed an epidemic form. In the remarks made under the heading " tour " you will see some particulars about this epidemic, and the arrangements made to arrest its progress, in which I was ably assisted by Ranchoddás Mangaldás.

13. I saw 97 cases of small-pox after vaccination, the cicatrices being most unmistakeable, and many other registered cases in which small-pox had followed ; but, as I could not detect the vaccination cicatrices, I do not acknowledge them, as in all probability they were unsuccessful cases of vaccination. The number is not large, considering that I saw 23,736 cases of vaccination, being at the rate of 4 in every 1,000 cases vaccinated.

Small-pox after Vaccination.

14. I find the Assistant Superintendents of great assistance ; most particularly are they useful in superintending the propagation of good lymph.

Assistant Superintendents.

It is impossible for the Superintendent to visit each vaccinator more than once a year, but the Assistant Superintendents have the means of doing so twice a year, and as they always carry good lymph with them, it is often the means of saving most valuable time.

2ndly.—In the case of false entries they have means and time at their disposal for making a searching enquiry.

3rdly.—They are greatly instrumental in teaching the vaccinators how to fill in, and forward new forms.

Assistant Superintendent Ranchoddás Mangaldás has shown a great zeal on several occasions ; he was the Assistant who helped me in carrying out the re-organization of vaccination at Mangarul, although Mangarul was not in his charge. I sent for him, because Assistant Superintendent Kánojí Jayarám had sent in his resignation, and had reported himself sick.

At Wadwán and Lakhtar, where some difficulty had been experienced by the vaccinators in carrying on work, I sent Assistant Superintendent Ranchoddás Mangaldás to arrange matters, which he did by his tact, long knowledge of and connection with the people of Káthiáwád. In reference to his activity, his yearly return speaks for itself. I know very little about Assistant Superintendent Kánojí Jayarám. I have never seen him ; he was in bad health in the rains, and when I was in his district in October, November and December he was away on leave. Last month he resigned the service ; but of this I am confident, that he brought considerable pressure to bear on the vaccinators in his district, causing them to do more work than they otherwise would have done, and was most instrumental in the preservation of good lymph.

15. Although in my remarks under the heading " tour " I have not mentioned the vaccinators favourably, still the average quantity of work done by each is very fair, viz., 2,289. The largest number vaccinated by any one man is 3,300. This man Purnáshankar of Jaitpur I had to punish for his laziness in November. It seems to have produced most excellent results, as since then he has been forwarding larger returns.

Vaccinators.

Five vaccinators have been dismissed during the year, three by Dr. Blanc and one by myself, for false entries, and the fifth by Dr. Sexton for being absent without leave. It may not be out of place to mention here that three of the vaccinators now employed are some of the men that Dr. Blanc alludes to in his report for 1871-72 as "a more untrustworthy and indolent set of men it would be difficult to find." The three men, above alluded to, were dismissed, and then reinstated by Dr. Blanc, viz., Bhímjí Dewrám, Tulshí Gígá and Gangárám Dayáljí.

During the year, besides those dismissed and the two mentioned below, the rest have all been fined or reprimanded. There are only two men whom I can mention favourably for the whole year, viz., Narottam Premjí of Wallá and Jíwáshankar of Pálitáná ; but I have not seen the work of the last mentioned.

16. In justice to the vaccinators I must add that they have great difficulties to contend with. The new plan organized by Dr. Blanc has dealt a heavy blow upon the vaccinators. Formerly, although they received smaller pay, and that irregularly, still they got a tattoo and free quarters supplied to them by the Darbár, besides food for themselves and beast, which, by order of the Darbár, was supplied to them gratis in every gaum. Now, when they go to gaums away from their homes, they have the greatest difficulty in procuring the commonest necessaries of life ; indeed in some gaums the inhabitants will not, or cannot, supply grain or grass, as I know to my cost. In others they are bound by vow not to sell things. In many gaums the people only store enough of these things to supply their own wants, and to part with any of their little hoard means short commons for themselves. Another difficulty the vaccinators have to contend with, is that they have to collect the children for vaccination themselves ; formerly they were collected by a Darbár sepoy. For the above reasons the vaccinators pay as short a visit as possible to each gaum (unless the villagers are charitable), and the consequence is, that the work is not as carefully done as it used to be.

17. During the year the two Assistant Superintendents reported 414 false entries, but on a close enquiry I found some of these were not false entries, and I have no doubt, if I could have gone through the whole myself, I should have found that more of them were mistakes. However, taking the whole 422 (including those I found), of these 236 were reported before I took over charge of the office, and the remainder 186 after I rejoined.

False Entries.

18. During the whole of my tour of nearly six months I found only 28 false names; and taking into consideration that I inspected 7,498 registered children, the number is not large. Besides, some of these the vaccinators explained by declaring they were travellers, but as I am unable to prove this I have given the whole number.

19. The cause of the greater number of false entries being, in my opinion, the fining of each vaccinator if he did not return 200 a month, I did not enforce Dr. Blanc's order on re-taking charge, and consequently the disease has died a natural death, as is shown by the following table:—

False Entries reported.

April...	...	... 100	August	...	... 17	December	...	... 0
May ...	...	... 108	September	...	... 31	January	...	... 0
June ...	...	... 28	October	...	... 25	February	...	... 0
July ...	...	... 108	November	...	... 5	March	...	... 0

20. Village registers have been distributed to most gaums, and copies forwarded to the Assistants and Division Officers. Captain Philips, Special Assistant, Gondal ; Captain Watson, 1st Assistant ; and Mr. Aston, 3rd Assistant, all at different times accompanied me to several gaums to test their correctness, and have taken the greatest interest in vaccination.

Village Registers.

Mr. Dhanjíshá Hormasjí, Special Assistant, Bántwá, also gave me great assistance and takes great interest in vaccination.

The Pátils or heads of gaums can seldom read or write, so that the "Patrakás,' as they call them, are very seldom examined by them. But they are useful to higher functionaries when on tour. Very often the Pátil cannot find the "Patrak," he having hidden it away *too* safely. Frequently, when it is at last produced, it drops out from under a tile or the end of some one's turband—the Pátil, as a rule, seldom having a safe place to preserve it in.

Dispensaries.

21. The dispensary returns are very small; a large number cannot be expected at present, as the dispensaries, which now forward returns, are two of them, built near very small gaums, and the other three miles from the town of Wadwán. The work is performed by the Hospital Assistants. I hope next year to show a better dispensary return, as the dispensaries of Gondal and Dhorájí have just been placed under my superintendence.

Expenditure.

22. The amount expended by Government is less than the amount sanctioned by 700 Rupees; the saving is owing almost entirely to the postal charges being much less; there is also a saving in travelling allowances and contingencies.

The saving in the postal charges was effected almost entirely by prohibiting correspondence between Assistant Superintendents and vaccinators, and by directing the latter to forward any correspondence they might have, with their weekly or monthly returns. I found they were writing at all times on the most frivolous and unnecessary subjects; this alone reduced the correspondence one-half.

The total amount sanctioned by the Chiefs this year is more than in 1871-72, because an extra grant was given to the vaccinators for bhattá.

The amount expended by the Chiefs has, during the past official year, exceeded that sanctioned by Rs. 452; but as the Chiefs' financial year begins in September, it is difficult to tell at present what the exact expenditure will be, but I anticipate it will be under the sanctioned amount.

In the Government financial year, just finished, bhattá had to be paid three times—in the Chiefs' year it will only come twice; this in itself accounts for the excess of expenditure sanctioned up to March.

Average Cost of each successful Vaccination.

23. The average cost of each successful operation performed by the Chiefs' vaccinators is very small, viz., 2 annas, 8 pies.

The reason of the large average cost to Government for each successful case, is, that there has been only one vaccinator during the past year; for part of 1871-72 there were nine, and of course many more operations performed, therefore making the average less.

The reason of the total sum expended by Government being greater, is, that the expenditure for Assistant Superintendents is greater than last year, they having been employed the whole of 1872-73 and only part of 1871-72.

Assistance from Chiefs.

24. I have always received the greatest assistance from the Darbárs, and in no one instance have I had to appeal to the Political Agent, or his Assistants. My plan is to write to the head kárbhárí first, and then, if assistance or redress is not given, I appeal to the District Officer.

I take this opportunity of publicly thanking the Chiefs for the assistance they have given me, and for the courtesy with which they have, as a rule, treated me.

Tour.

25. I left Rájkot on the 6th October 1872 for Gondal. My object for going in this direction first, was on account of the Gondal and Jaitpur vaccinators having both reported themselves sick for some time past, and for that reason having done very little work for two or three months.

The Gondal Assistant Vaccinator Maganlál showed signs of having been ill. His work was indifferent, but the principal faults I had to find with him, were his not vaccinating his outlying gaums, and not vaccinating the Dheds. This is a continual cause of fining against one and all of the vaccinators, and apparently hitherto with very little benefit to these low-caste people.

After visiting Gondal I continued on in a southerly direction to Jaitpur. Here Purnáshankar's work, if any thing, was worse than Maganlál's; but Purnáshankar looked well and was, therefore, sent off to work under pain of immediate dismissal.

From Jaitpur I went south-west to Mánikwádá, where, upon the whole, Pránlál's work was good, but the quantity somewhat short. From Mánikwádá I went to Dhoráj í an outlying part of the Gondal Táluká.

In the month of November I visited another part of the Gondal Táluká and Sirdár, the extreme eastern part of the Rájkot Táluká, in charge of Khushál; here the work was good, but there were a great many unprotected cases, due to the reason that it is some distance from the vaccinator's home. They, none of them, will travel far till they are driven. From Sirdár I visited the extreme eastern part of Nawánagar, viz., A'dkot, in charge of Tulshí Rájárám; the work was pretty good upon the whole. Continuing east, I arrived at Petrá Kotrá, and examined the work of Apprentice Vaccinator Bhimjí Dewrám. His work was not satisfactory, the proportion of unsuccessful cases being very large.

From this district I continued farther east and somewhat southerly to the Bháwanagar Táluká, and examined the work of the Vaccinator Tulshí Gigá; his work was on the whole good. But in one gaum, Amlá, that I visited, only four koss from the vaccinator's home, I found small-pox raging, and there had been several deaths; the vaccinator had not visited the gaum for one and a half years.

In the month of December, after seeing Tulshí Gigá's work, I went north-east to Wallá, another part of the Bháwanagar Táluká, in charge of Assistant Vaccinator Narottam Premjí. His work was good, though he might have done more, for he had not visited all his outlying gaums, or vaccinated all the Dheds.

From Wallá Táluká I went north and north-west to Botá l, Bhádlí and Jasdan, and visited the work of Bhímjí Dewrá n; his work was bad in every way, many unvaccinated and the percentage of success small in comparison to the other stations visited. Besides which the Darbár sent in charges against him for laziness. I, therefore, sent him to Virá-wal, where there was a vacancy, and sent another man to Botád. The Jasdan man's work (Tulshí Rájárám) was pretty good. I also visited the Sáelá Táluká, and saw Rámshankar's work. His work is the best I have seen throughout the year. At the latter end of the month I visited the two Rájkot Táluká vaccinators' work. Early in January I travelled north and visited more of the two last-mentioned vaccinators' work. I was much dissatisfied with both—so much so with Motilál that I reported him for false names and laziness to the Superintendent General. Khushál's work was good, but I found that he seldom visited his outlying gaums; consequently he had a great number of children unprotected.

After going as far as Chotilá I turned round and went south-west to Dráphá, where the work was simply disgraceful; no new work to be seen, and half the children were unprotected. The vaccinator had been dismissed before my arrival, and the new man was bringing along his lymph from another táluká. From Dráphá I went south-east to Junágad, passing through the large Gondal Táluká, enroute examining a few outlying gaums of Nawánagar, Bhánwad and Bántwá.

In February I thoroughly examined the work done in Junágad by Harilál. This man was a candidate to succeed Mr. Kánojí Jayarám; his work was fair in quantity, but the

cicatrices were small, and he had entirely neglected to vaccinate Dheds and Bhangís ; consequently a great number of unprotected children were inspected in those castes.

From Junágad I went south to Mangarul. Here the state of things was painful in the extreme. Since my visit between three and four years ago no one had visited these parts; during my two and a quarter years' absence from Káthiáwád no Superintendent had been near the táluká. The last vaccinator had been transferred to another station because he quarrelled with the Darbár; the man before him had been dismissed, and then reinstated and appointed to another station, by Dr. Blanc.

I found that the Darbár and people had lost all faith in vaccination, and no wonder about 2,000 people had died of small-pox, although there had been a resident vaccinator; but many of the children vaccinated by him showed no marks at all, and two or three hundred that he is stated to have vaccinated, had died of small-pox.

I visited one gaum, Shápur, in which every human creature under 20 years of age was down with small-pox; and though it was only three koss from Mangarul, the vaccinator had never even visited the place. After some difficulty I got the Darbár to agree to all the children in the town of Mangarul being vaccinated, and then and not till then they were to form their opinion of the efficacy of vaccination. While I was encamped at Mangarul an event happened which greatly facilitated this object. The kámdár had two children, one a few years old, the other a few months; the former had been vaccinated, the other not. The new vaccinator Pránlál, whom I had brought with me, had advised the kámdár to have his youngest child vaccinated; he said he would when the child was a little older. Pránlál told him, he had better have it done at once, else his child would catch small-pox and die like most of the other children in the town. The next week the child sickened, and when I left had confluent small-pox; the protected child was not attacked. To ensure the children being vaccinated quickly and well, I placed an umedwár at Pránlál's disposal, and also sent an Assistant Superintendent to see that good lymph was introduced, and that the work was carefully performed. Yesterday I received Pránlál's and the umedwár's return; they had succeeded in vaccinating 280 children in March, so I hope they will succeed in stamping out the disease.

In March I travelled round by Navíbandar, Porbandar and Máhádápur. The marching here is most difficult, what with the mouths of large rivers and the sheet rock; four kos a march is the utmost the carts can get over; the rock is cut into deep ruts, and most dangerous for horses. One river was so broad I was all day getting my kit over.

For the above reasons I suppose the Porbandar and Bhánwad men had not been in the habit of going to these parts, as I found several gaums had never been visited.

The Porbandar (Gangárám) man's work, what he had done, was pretty good, but his vesicles were small. He had not vaccinated the low castes, or visited the out-of-the-way villages in his charge. Some of these villages cannot be visited except in boats (which means of conveyance a vaccinator has not at his command) till March, and then you have to wade through one or two miles of water up to the saddle girths.

The Bántwá (Haríbhái Narbhairám) man's work was much the same as Porbandar; very few low caste vaccinated, and his outlying villages not visited.

The latter part of March I continued in a westerly direction, and examined the Bhánwad (Digámbar) man's work, which was very bad. He had vaccinated very few, his percentage of successful cases was comparatively small, and for two years he had not visited his distant gaums, although only about 20 miles from his home. I found also at one gaum that he had taken money from the parents of children he had vaccinated.

The last station I visited was Khámbáliá, Nawánagar, in charge of Nánálál. His work is good, but, like all others, he had not been 10 kos from his home.

Altogether during the time of my tour of a little under six months I travelled 1,828 miles, examined 19 vaccinators' work, and saw 23,736 vaccinated children.

Concluding Remarks.

26. In conclusion I beg to state that, whatever remarks I have made, I mean nothing *in any way* personal. Dr. Blanc performed a right good service in changing the system—a change much wanted, and both Colonel Keatinge and Colonel Anderson, at my suggestion, had tried to effect an alteration years before. But Dr. Blanc made, I consider, two mistakes in his system—

I. Taking all responsibility out of the hands of the Chiefs.

II. Substituting 5 rupees a month bhattá in place of pony, board, and fodder.

I do not blame Dr. Blanc for this, because he had not a sufficient knowledge of the country, or the customs of the people, and was only following the policy of the time. The new scheme has worked well, inasmuch as vaccination is now much more generally distributed throughout Káthiáwád than it was formerly; and if there was any supervision of the Gáikawád's gaums, the result would be still better.

Camp Khambáliá, 16*th April* 1873.

REWA' KA'NTHA' CIRCLE.

Superintendent.—Assistant Surgeon S. B. HALIDAY.

Establishment.—1 Assistant Superintendent, 1 Clerk, 5 Vaccinators under Local Funds, 10 under Native Chiefs, and 2 Dispensaries.

Population estimated at 445,166. Total cost, Rs. 7,013-0-6. Cost of each successful case, 6 annas and 2 pies.

Establishments.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those unknown from the Total.	
			Increase.	Decrease.		In Primary Vaccination.	In Revaccination.
Government	1871-72	1,268	.....	.....	1,182	95·6	24·0
	1872-73	.....	.....	1,268	.....	.....	...
Local Funds	1871-72	7,314	.....	.....	7,092	97·1	80·5
	1872-73	6,950	.....	364	6,733	98·1	80·0
Native Chiefs	1871-72	10,899	.....	.....	10,176	95·6	30·6
	1872-73	11,838	939	.....	11,243	96·2	72·9
Dispensaries	1871-72	465	.....	.....	411	89·0	100·0
	1872-73	487	22	.....	424	96·1	48·2

The above table shows a total number of 19,275 persons operated on during the year 1872-73, and a decrease of 671.

Cause of Decrease.

1. The cause of this decrease is owing to fever and dengue having prevailed to a great extent during the year.

Percentage of Success.

2. Percentage of success this year is 96·7, which is 1·1 more than last year, which goes far to balance the decrease in the total.

Average of Operations by each Vaccinator.

3. The average number of operations by each vaccinator is 1,253.

Sex.

4. The number of males is 9,541, and of females 9,388, which shows that almost as many females as males were vaccinated.

Caste.

5. Hindús give the largest number—16,914, Musalmáns only 890, and Párśís 20. Considering the large number of Musalmáns in this Circle the number vaccinated is small, but they are very prejudiced and obstinate. The Párśís show a fair return for the small number of their caste in the Circle.

6 The number of children vaccinated under one year is 5,774. This is smaller than is desirable, but many of the Natives have a prejudice to allow their children to be vaccinated when very young.

Age.

Re-vaccination.

7. 348 re-vaccinations were performed; all that can be said of this is, that it is holding its ground fairly.

Lymph, Vesicles, Cicatrices.

8. The lymph in use is of very fair quality. In November 1872 four tubes of English lymph were received from the Superintendent General of Vaccination: two of them were given to Dámodár Dayáshankar, the Chotá Udaipur vaccinator, and he vaccinated five children with them, and all the children had good vesicles, and from these he continued his work. The other two tubes were given to Hirálál Vishwanáth, one of the Rájpiplá vaccinators, but they failed. The vesicles which I have seen were on the whole very good, and the cicatrices very fairly marked.

Small-pox.

9. Several sporadic cases of small-pox were reported to me during the year, but the disease did not assume any serious extent, and soon died out. In Bálásinur I was informed that several deaths took place from small-pox, but on inquiry I could not find any reliable proof, as no record was kept of the deaths, and all I could ascertain, from verbal inquiry, was that several children died from it, and these had been vaccinated. From the description I have received of some of the cases of supposed small-pox I conclude they were some other eruption.

Inoculation.

10. Inoculation is not practised in any part of the Circle as far as I am aware.

Husband's Tubes.

11. These are only used for transmitting lymph to a distance, and the importance of arm to arm vaccination is impressed fully on the vaccinators, and from the small number of tubes used there is no doubt it is carefully attended to.

Assistant Superintendent.

12. The Assistant Superintendent has worked well during the year. But it must always be borne in mind that he was formerly a vaccinator, and perhaps might be a little too lenient with the vaccinators.

Vaccinators.

13. The vaccinators during the year worked well—some of them exceptionally well. Hirálál Vishwánáth, one of the Rájpiplá vaccinators, has given me the greatest satisfaction. One vaccinator was dismissed for neglect of duty. Some of them have a tendency to work only close to their head-quarters, and not visiting the villages on the outlying portion of their district. I have introduced two columns into the weekly reports, showing the distance travelled daily and the number of "kos" distant from head-quarters; also in the monthly return two spaces for inserting the name of the camp from which it is depatched, and the distance in "kos" from the nearest English post-office. By these means I have established a check on the movements of the vaccinators. A good map of the districts would be of great assistance in enabling me to trace the vaccinators' movements.

Dispensaries.

14. There are two dispensaries: one in Godhrá, where the late Sub-Assistant Surgeon Saruplál Bálakrám, who took great interest in the progress of vaccination, succeeded in overcoming, to a great extent, the prejudices of some of the Natives, and vaccinated a large number of children. The other dispensary is in Báriá, under Native management, and vaccination is carried on there fairly.

15. In the Native States the vaccinators have a good deal to discourage them in the way of want of willing support from the Native Chiefs, and in receiving their pay irregularly, frequently being several months in arrears. The way in which Native Chiefs with large incomes dole out a few Rupees for the purpose of mitigating such a dangerous, loathsome, and disabling disease as small-pox, is truly sad ; yet most of them appreciate the advantages of the protective power of vaccination. While I was at Chotá Udaipur I vaccinated several of the Rájáh's family at his request, and while there I amputated the arm of a sepoy whose hand was shot off by a matchlock ; the remains of the hand had been hacked off by a Native hákim, and both bones with jagged ends were protruding several inches from a ragged wound. The patient was put under the influence chloroform for the operation. About a couple of months afterwards Mr. Propert, the Agent of His Excellency the Governor, told me he saw the man, and that his arm was quite healed.

Native States.

16. I am unable to say that vaccination is popular, but the Bheels submit to it generally with an indifferent air, which seems to say, if it pleases you, it does not do me much harm, and I will allow it. As a rule Bheels do not seem to care about the disfiguration of their persons. They are always burning and scarifying themselves all over the body for the purpose of curing diseases, frequently "firing " young infants in a truly alarming manner.

Popularity of Vaccination.

17. The Natives believe that the small-pox is a goddess, and that it is improper to interfere with her. They are also decidedly partial to *drinking*, especially at their various feasts, when they are quite unmanageable, and sometimes dangerous. I was at Jhálod during the Holi, and for several days could scarcely get any children to inspect, as most of the Bheels were drunk, women as well as men.

Hindrances.

18. The expenditure for the Local Funds was Rs. 1,484, for the Native States Rs. 2,531-11-0, and for the sanctioned establishment of the Superintendent Rs. 2,997-5-6, total Rs. 7,013-0-6. This latter represents the pay of the Assistant Superintendent, a clerk, 4 peons, and stationery, &c.

Expenditure.

19. I had frequently, during the year, to request the assistance of the Political Agent Rewá Kánthá, and it was always most willingly and effectually rendered. Through this means I was enabled to get a grant of Rs. 3 Bábáshái per annum for each vaccinator for the expense of stationery ; formerly they generally had to pay for it out of their own pockets.

Aid from the Political Agent.

20. I started on my tour on the 1st November 1872, and as this was my first regular tour I wished to make a complete circuit of my Circle, so as to obtain personal information of each vaccinator and his district. In this I succeeded to my satisfaction, as I saw all the vaccinators and their lymph, and method of working, and examined their registers. I inspected 6,799 children, visited 215 villages, and travelled 924 miles.

Tour.

Camp Dohad, 5th May 1873.

PRESIDENCY CIRCLE.

Local Superintendent.—Sub-Assistant Surgeon ANANTA' CHANDROBA', G.G.M.C.

Establishment.—11 Vaccinators (Municipal).

Population, 644,405 (Census of 1872). Total cost, Rs. 11,159-13-3. Average cost of each successful operation, 13 annas and 7 pies.

Establishment.	Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those unknown from the Total.	
			Increase.	Decrease.		In primary Vaccination.	In Revaccination.
Municipal	1871-72	15,457	.....	.....	11,848	90·2	50·1
	1872-73.	16,415	958	.....	13,055	89·0	44·1

Preliminary Observations.

A continuance, with increased virulence, of the terrible small-pox epidemic that commenced in January 1872, topped towards the end by a fresh outbreak equally extensive, but far less virulent and fatal, marked the features of the year that ended on the 31st March 1873. Small-pox was never absent during the course of the whole year. The fresh epidemic commencing in January 1872 rapidly increased in severity and extent, and was at its acme during April, in which month alone 436 persons fell victims to this direful disease. The epidemic then gradually abated, till in November we had only 18 deaths from small-pox. In the December following, however, ominous signs of a fresh outbreak began to make their appearance. More fresh attacks of small-pox were everywhere met with, and the deaths during that month numbered 35. It then spread like wildfire over the entire length and breadth of the island, and the disease was to be seen in every nook and corner of the city and its suburbs. There was scarcely a house or a family that had not its sufferer from this disease. The attacks, however, were mild, and many passed through safely. There were 70 deaths in January, 129 in February, and 189 in March.

2. The destruction of human life from this fell disease, during the past 15 months, has been fearfully great. No less than 2,233 persons succumbed to its direful influence, to say nothing of the many that must have been maimed for life, and the very existence of many of whom must have been rendered wretched and miserable in the extreme. The carnage was great amongst the children, and especially among the infant portion, of whom some 892 under 12 months of age, and 425 between 12 and 24 months, were carried away, making a total of 1,317. 698 between 2 and 9 years brings the number to 2,015, leaving 281 for ages above 10 years, of whom 5 were very aged indeed. The following table shows the number of deaths at different ages during the last 15 months, commencing January 1st 1872, and ending March 31st 1873 :—

Ages.	From birth to 15 days.	From 16 days to one month.	Between 1 and 3 months.	Between 3 and 6 months.	Between 6 and 9 months.	Between 9 and 12 months.	Between 12 and 15 months.	Between 15 and 18 months.	Between 18 and 21 months.	Between 21 and 24 months.	Between 2 and 4 years.	Between 4 and 6 years.	Between 6 and 9 years.	Between 9 and 13 years.	Between 13 and 24 years.	Between 24 and 44 years.	Upwards.	Total Deaths.
Deaths from Small-pox	6	21	69	186	195	415	71	101	15	238	427	176	95	44	99	70	5	2,233

These facts speak unequivocably for themselves; comment on them would be vain. To proceed—As a natural consequence of this frightful state of things our vaccine stations were scenes of unusually great bustle and activity almost throughout the year. Never during my many years' connection with the department was there such a run upon it as in the month of April 1872. Often and often were our stations crowded to suffocation. At times there was scarcely room to accommodate all the applicants for the operation During these trying times animal lymph was our only salvation. But for it I do not know what we should have been able to do. 30 and 40 vaccinifers would not have been sufficient; and we could never, at the best of times, be certain of securing three or four. Lymph preserved in tubes might have been supplied—as to a certain extent actually supplied—from the Mofussil, but experience has taught me not to depend much upon it; and under the peculiar circumstances of the times they would have been worse than useless. Either Government would have been compelled to permit and assist in the forcible taking of lymph, from successfully vaccinated children, or the deaths from small-pox would have been more than they already have been. Fortunately, too, there were scarcely any failures in the operations on the heifers; and not on a single occasion have I been under the necessity of sending a single applicant away unvaccinated. During the month of April alone 2,583 persons were primarily vaccinated—a number almost one-third of the average yearly vaccinations performed in Bombay for many years past.

Operations of the year.

3. As the result of this unusual state of things we had to perform 16,823 operations of which 14,940 were primary, and 1,883 re-vaccinations. Among the primary operations there was an excess of 408 operations over the number of persons vaccinated; the number operated upon being 14,532.

Sex, Caste, Age.

4. Of these there were 8,586 males and 5,946 females, the males as usual preponderating. 1,031 were Christians, 9,835 Hindús, 1,813 Mahomedans, 848 Pársís, and 1,005 of other castes, including Jews,—8,015 under and 6,517 above one year of age.

Result.

5. Of the primary operations 12,343 were successful, giving a percentage of success of 89·55; 1,517 were unsuccessful; and in 1,080 the result could not be ascertained.

Re-vaccinations.

6. During the year under report we had only 1,883 re-vaccinations against the 3,543 of the year preceding,—a decrease of 1,660. It will be recollected, however, that during the year preceding the last, owing to the exceptional circumstances of the times, the number of re-vaccinations was particularly large. We had not only subjects from amongst the general community, but

hundreds were vaccinated from the Dockyard employés, and the crews of the war and troop ships that were then in the harbour. Many of these sources have naturally failed us and hence the decrease. Indeed, had it not been for the Native regiments, and the schools for European children, we should scarcely have had a decent number of re-vaccinations to show in our present returns and report. Nor is there any very great likelihood of our being called upon to perform re-vaccinations, in the members of the general community, for some considerable time to come yet. Nor, indeed, is this to my mind any reason for being concerned, for whatever the experience or opinion of others on the subject, I have a firm conviction that vaccination, properly performed, with genuine lymph, is as sure a prevention of small-pox as a natural attack of small-pox itself. During a professional career of 26 years—ever since, in fact, the time of my student days in the Grant Medical College—I can bring to my mind some eight or nine instances only of small-pox attacking persons who, to my knowledge, were to all appearances successfully vaccinated ; and many have heard of a few more. But in all those that I saw they were invariably of the mild varioloid kind, and none proved fatal. The present generation of the Prabhús and Shenvís in Bombay is for the most part protected by vaccination ; and though one meets with cases of small-pox amongst them frequently enough, one scarcely ever hears of a case of small-pox in a protected person, notwithstanding that their internal economy, and their customs and observances of the occasions, bring them in the most intimate contact with subjects of small-pox.

Result.

7. Of the 1,883 re-vaccinated, only 712 proved successful, giving a percentage of success of 44·11 ; in 902 the operations failed ; and in 269 the result could not be ascertained

General Increase.

8. Despite the large decrease in our re-vaccinations there has been an absolute increase of 958 in the total number operated upon, giving us an increase of 2,618 persons primarily vaccinated ; and when it is known that this increase was for the most part in children under one year of age, the result of the past year's work cannot but be taken as in every way satisfactory, at least so far as it goes. The number operated upon primarily stood thus as to ages :—8,015 under and 6,517 above one year of age. In the history of the Presidency Vaccine Department this is the first year wherein not only there has been a large amount of work done, but the number of persons vaccinated under one year of age has exceeded, and that to an appreciable extent, those above that age. Indeed, the number of persons vaccinated under one year of age itself exceeds the average annual work of many years past, excluding the last two or three. Thus far every thing is satisfactory. But I am afraid this will tell materially on our operations during the current year.

Lymph.

9. We always had a large supply of very good lymph on hand.

Animal Vaccination.

10. Owing to the exceptional circumstances of the year we had to inoculate 241 heifers. Of these all but eleven proved successful. Of the eleven failures six were inoculated with lymph received from Dr. Warlomont. We received from this gentleman in all nine supplies of animal lymph. The first seven of these failed completely, but the last two, received and used in the month of March last, both proved successful. The following table shows our monthly animal inoculations, with the nature of lymph used, and the result of the operations :—

	April 1872.	May "	June "	July "	August "	Sept. "	October "	Nov. "	Dec. "	January 1873	Feb. "	March "	Total.
Inoculated with Bombay Lymph	27	26	25	16	13	13	12	16	15	20	23	27	233
Successful	27	26	24	15	11	13	12	16	14	20	23	27	228
Failed	...	...	1	1	2	...	...	...	1	...	...	...	5
Inoculated with Dr. Warlomont's Lymph ...	...	3	...	1	...	1	...	...	1	...	...	2	8
Successful	..	...	...	...	...	...	...	...	...	...	...	2	2
Failed	...	3	...	1	...	1	...	...	1	...	...	...	6

With 24 exceptions all the re-vaccinations were performed with animal lymph. Out of the 14,940 primary operations, in 12,663 animal lymph was used. Of these 10,577 proved successful, giving a percentage of 90·37 of success.

Small-pox.

11. In his annual Report of Vaccine Operations for the year 1870-71 Dr. Pinkerton, the Superintendent General of Vaccination, makes the following observations :—

"It appears that small-pox has been generally very little fatal up to the close of the year 1870-71, but I fear much that it is now on the increase (May), and it seems to be spreading over the whole world. I hope our vaccinations will stand the test, and demonstrate its power to guard from death by the most fell and loathsome of all diseases." His worst fears and anticipations have been confirmed. We have had no respite from small-pox from the year 1871, and at times the disease was fearfully fatal. Yet his hopes too—at least so far as Bombay is concerned, and so far as my personal knowledge and the information on the subject obtained from the mortuary reports go—have also, in my opinion, been fully realized. During the year under report 1,620 persons died from small-pox. The following table shows the number of deaths as they occurred in each of the months of the year :—

Months of the year.	April 1872.	May "	June "	July "	August "	Sept. "	October "	Nov. "	Dec. "	January 1873.	February "	March "	Total.
Deaths from small-pox .	437	327	211	117	28	33	26	18	36	70	129	189	1,620*

*This should be 1,637.—P. S. T.

The following three tables show the deaths from small-pox arranged according to localities and castes—localities and ages—and castes and ages; with additional two columns in the two last, showing the number not previously vaccinated, and those that were—so far as the information is given in the mortuary reports :—

	Kolába.	Fort.	Esplanade.	Market.	Mándvi.	Chakhlá.	Umbarkhádi.	Dongari.	Dhobi Talão.	Phanaswádi.	Bhuleshwar.	Khára Talão.	Kumbhárwádá.	Khetwádi.	Girgaum.	Chawpátti.	Walkeshwar.	Máhálakshumi.	Mázagaon.	Tádwádi.	Kámáthipurá.	Byculla.	Parel.	Shiwri.	Sco.	Máhim.	Warli.	Unknown.	Total.
Buddhists and Jains	..	9	..	7	12	4	2	1	1	..	15	3	..	..	..	..	..	..	3	..	1	..	..	..	..	..	..	..	58
Bráhmins	..	3	..	11	5	2	..	..	5	6	11	3	1	3	8	..	..	1	..	1	3	..	..	..	..	1	..	..	64
Lingáyats and Bhátyás	..	3	..	16	16	2	2	1	4	..	3	4	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	51
Hindus of other castes	11	9	2	48	61	11	19	60	81	17	15	26	23	44	78	9	3	9	38	15	40	25	31	5	10	16	1	..	707
Hindú outcastes	1	1	1	5	6	2	2	..	6	..	3	3	1	14	2	..	..	..	1	1	26	11	7	..	..	..	..	..	93
Musaímáns	..	8	..	17	8	55	53	6	4	..	30	40	16	11	3	1	..	..	5	10	80	6	3	1	..	3	..	..	369
Pársis	3	68	..	11	..	..	..	..	48	..	10	1	..	11	1	..	..	3	7	..	..	..	..	..	..	..	..	..	163
Jewis	..	..	..	..	4	..	2	..	..	..	..	..	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	7
Native Christians	1	..	..	3	2	..	1	..	15	..	..	..	4	2	7	..	..	..	3	16	3	..	6	1	4	1	1	1	71
Europeans	2	1	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	1	..	1	1	..	..	..	..	..	..	7
Indo-Europeans	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1	..	..	1
Negro Africans	..	1	..	1	..	1	7	1	..	..	..	2	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	13
Kolís or Fishermen	..	..	..	..	5	..	..	..	..	..	..	..	..	1	..	..	..	..	7	..	1	..	..	10	1	..	..	..	25
	18	103	3	119	119	77	88	69	165	23	87	82	45	86	99	10	3	13	65	43	156	43	47	17	15	22	2	1	1,620

	Kolába.	Fort.	Esplanade.	Market.	Mándvi.	Chakhlá.	Umbarkhádi.	Dongari.	Dhobi Talão.	Phanaswádi.	Bhuleshwar.	Khára Talão.	Kumbhárwádá.	Khetwádi.	Girgaum.	Chawpátti.	Walkeshwar.	Máhálakshumi.	Mázagaon.	Tádwádi.	Kámáthipurá.	Byculla.	Parel.	Shiwri.	Sco.	Máhim.	Warli.	Unknown.	Total.
From birth to 15 days	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	1	..	1	..	..	1	..	..	..	1	5
From 16 days to one	..	..	..	1	2	..	2	1	..	..	1	1	..	1	1	..	..	1	..	..	1	1	..	..	1	..	..	..	14
6 months	4	7	..	15	13	6	15	14	17	5	10	9	5	13	11	2	1	1	10	2	19	5	7	..	2	1	..	..	194
months	7	16	2	36	38	19	26	21	49	5	23	24	16	27	36	2	2	3	19	3	41	11	12	9	..	3	..	..	450
3 months	1	20	..	19	12	10	4	2	17	8	9	4	5	3	9	..	..	..	3	2	6	1	6	..	..	1	1	..	143
4 years	4	31	..	32	37	26	26	23	41	4	33	27	15	22	24	3	..	3	18	5	43	12	11	5	8	12	1	..	466
6 years	..	11	..	2	13	3	4	3	15	..	6	8	1	10	5	2	..	2	5	..	18	3	1	1	2	2	..	..	117
9 years	..	10	1	6	2	5	2	..	9	..	2	4	..	4	2	..	..	..	2	1	13	2	2	..	..	2	..	..	69
13 years	1	3	..	2	1	4	1	1	2	..	1	1	1	3	2	..	..	..	..	3	1	2	3	..	1	..	..	..	33
and 24 years	..	3	..	5	1	1	6	3	9	1	1	2	1	1	6	1	..	3	5	7	9	5	2	1	..	..	..	..	73
and 44 years	1	2	..	1	..	3	2	1	4	..	1	2	1	2	3	..	..	..	2	20	3	1	3	..	..	1	..	..	53
U	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	1	..	..	..	1	..	..	..	3
Total	18	103	3	119	119	77	88	69	165	23	87	82	45	86	99	10	3	13	65	43	156	43	47	17	15	22	2	1	1,620
No. previously not vaccinated	10	14	..	53	66	23	34	50	57	10	28	34	15	52	49	6	2	7	21	5	65	26	9	1	10	1	1	..	648
No. previously vaccinated	..	1	..	2	2	1	..	1	..	1	3	3	1	1	4	1	..	1	1	..	5	2	1	..	..	..	..	..	3

Castes.	Birth to 15 days.	From 16 days to 1 month.	Between 1 and 6 months.	Between 6 and 12 months.	Between 12 and 23 months.	Between 2 and 4 years.	Between 4 and 6 years.	Between 6 and 9 years.	Between 9 and 13 years	Between 13 and 24 years.	Between 24 and 44 years.	Upwards.	Total.	Not vaccinated.	Vaccinated.
Budhists and Jains	...	...	7	10	14	21	3	2	...	1	...	...	58	18	...
Bráhmins, &c.....	...	...	9	24	5	14	7	2	1	1	1	...	64	30	2
Lingávats and Bhátyás	...	...	4	15	14	11	3	2	1	1	...	...	51	15	...
Hindús of other Castes.....	3	10	101	219	53	193	39	22	13	36	12	1	707	406	21
Hindú out-castes	...	2	20	33	2	17	8	5	3	1	2	...	93	66	2
Musalmáns	1	1	38	89	24	130	24	20	9	8	15	1	361	91	5
Pársis.....	...	...	10	31	28	49	25	13	3	4	...	...	163	...	...
Jews	...	...	2	3	1	...	...	1	...	...	...	...	7	...	1
Native Christians	1	1	1	9	2	19	3	2	3	13	16	1	71	13	...
Europeans	...	...	...	3	...	...	1	...	...	1	2	...	7	...	...
Indo-Europeans	...	.	...	1	...	...	...	...	...	...	...	...	1	...	....
Negro Africans	...	...	1	...	...	...	1	...	..	6	5	...	13	2	...
Kolis or Fishermen	...	...	1	13	...	7	3	...	...	1	...	...	25	7	...
Total.....	5	14	194	450	143	466	117	69	33	73	53	3	1,620	648	31

12. It will be seen from the above tables that no part of Bombay escaped from the effects of the outbreaks of small-pox; but there are some localities, such as Dhobí Taláo, Kámáthípurá, Market, Mándví, Fort, Girgaum, Umbarkhádí, Bhuleshwar, Khetwádí, Khárá Taláo, Chakhlá, and Dongarí, that suffered most terribly. The Fort and Dhobí Taláo Districts are of late generally not so badly off in this respect; but, during the past year, the unprecedentedly high mortality amongst the Pársís has brought these places prominently forward. Of the 103 deaths in the Fort District, 68 were among the Pársís alone; and of the 165 of Dhobí Taláo, 48 are among Pársís.

13. It does appear a strange circumstance that, year after year, the same places should show the greatest mortality from small-pox, and this in spite of the existence of a large vaccine establishment presumably using its very best efforts in those very places. To one unacquainted with the circumstances of the place, the question would naturally arise—what can all this be owing to? Can it be that the Vaccine Department has been remiss in the discharge of its duties? May it be that the operations are carelessly performed?—perhaps with indifferent or even bad lymph? Or, indeed, is it, really after all, that the animal lymph that has been so freely and extensively used of late by ment is not so protective as humanized vaccine lymph? The last suppos once and for ever be dismissed from our minds; for this high mortality of t s a chronic state of things, as will be seen from the following table, and therefo be attributed to animal lymph, which has been in use only for the last three yea

Years.	Kolába.	Fort.	Esplanade.	Market.	Mándví.	Chakhlá.	Umbarkhádí.	Dongarí.	Dhobí Taláo.	Phanaswádí.	Buleshwar.	Khárá Taláo.	Khumbhárwádá.	Khetwádí.	Girgaum.	Chawapátí.	Walkeshwar.	Máhálakshmí.	Mázagon.	Tádwádí	Kámáthipurá and Byculla.	Parel.	Shiwrí.	Sion.	Málím.	Warlí.		
1863...	...27	23	10	84	200		234		109		40	102	61	3	7	12	33	3	83	13	9	26	18	7			113
1864...	...68	104	26	123	176		223		193		45	112	144	16	13	10	66	10	240	5	5	15	21	52			278
1865...	... 8	51	5	45	66	51	34	35	32	5	29	13	17	24	13	29	11	8	29	4	62	5	1	2	2	...		566
1866...	...12	29	8	112	53	111	153	71	73	19	63	51	30	38	33	9	22	18	34	6	113	2	...	1	3	1		979
1867...	... 3	21	33	83	143	111	74	62	46	14	36	46	49	29	32	13	5	1	18	9	162	13	...	3	23	14		1055
1868..	...28	61	6	117	31	64	60	63	72	35	40	54	48	56	52	12	11	...	47	11	144	24	22	22	35	5		1,123
1869...	...29	25	10	81	142	149	227	152	86	25	120	109	84	46	56	11	12	2	37	14	217	29	8	10	17	12		1,725
1870...	...20	27	1	51	52	82	77	31	18	6	21	19	11	6	6	2	4	...	17	4	36	14	14	5	5	10		566
1871...	... 4	20	4	66	44	33	81	80	35	20	48	53	36	21	26	6	9	2	57	6	170	12	1	11	18	33		919
1872...	...26	103	6	115	185	119	156	79	147	30	104	94	84	72	55	4	7	11	51	24	251	54	4	4	24	9	1	1,854

Nor is the explanation far to seek. It has been several times expressed in our Annual Reports that the Vaccine Department has, practically, no influence whatever on the Mahomedan portion of the community, from the poorest mendicant and fakír to the richest merchant and millionaire, wherever residing. Former experience having taught that assault and abuse are the only, but certain, recompense of any interference or officiousness on the part of our establishment, and persuasion in whatever shape useless, no attempt even, at it, is made by our men. It thus happens that the number of Mahomedans vaccinated almost wholly consist of such as are brought to the stations for the operation at their own sweet and free will, and at their own convenience; and improvident and apathetic as they generally are, and having, besides, in their general ignorance, a false sense of tenderness for their little ones, believing them to be too tender for the operation till they are thee or four years old, it very frequently happens that they are surprised by that terrible scourge of humanity which respects neither the rank or position, caste or creed, nor the color or age of any body, and is supremely indifferent to their convenience. A painful intance, in corroboration of this statement, was met with last year in connection with the district of Kámáthípurá.

14. That I may be acquainted with the localities where small-pox was prevailing most, or where its ravages were the greatest, so that I may be enabled to visit those places specially and more frequently than otherwise would have been the case, I was in the habit of referring to the mortuary returns as they appear in the daily papers. I found that Kámáthípurá was a locality that had the greatest number of deaths from small-pox. I began to work then twice a week, but no change was produced. Thrice a week and even oftener, and yet without at all lessening the deaths. Do what I would, I always found that I had made no impression upon the disease in that quarter. I know that some of the Kámáthís and the low-caste people, that live there in such numbers, tried to conceal their children, not that they had no confidence in the protective power of vaccination, but because small-pox was actually present in their homes, or in their immediate neighbourhood and the were sore afraid to incur the displeasure of the dreaded deity "Devi." The fear of being lled upon to furnish lymph in case of success must have had its share of influence, too, to ertain extent; but still all this was not sufficient to account for the persistent morta of the place. I was astounded; I did not know what to say or do. I could only my operations there, though very few subjects were procurable for operation. The owever, was satisfactorily cleared when tabulating the deaths from small-pox, found that the mortality was chiefly amongst the Mahomedan portion of the commu om I scarcely ever saw at our improvised stations, during our visits there, and it w y that had paid so dearly for their temerity. Out of a mortality of 156 there were 80 s among the Mahomedans, and only 40 among the Hindús, and 20 in the low-caste peo that throng the place in such numbers.

15. The same may be said with, if possible, less reservation of the Párs'ís, the Bhátyá Lóhánás, and the Kutchí Hindús generally, and it is these communities that are almost e first to suffer severely, and the rest are then forcibly drawn into the vortex created y them. A reference to the tables will at once show that it is such localities alone, as are nhabited, that suffer most from small-pox.

16. It is very sad to contemplate the enormous loss of human life that takes place, year a year, solely as the results of improvidence and procrastination, aided afterwards, to a c n extent, perhaps, by ignorance and superstition —in a community, too, that does lack confidence in the protective power of vaccination, nor has any serious or unsu table religious scruples to overcome, but who, on the contrary, get their children vacci by the thousand without any let or hindrance, social or religious, and who

generally suffer, simply because they are rather improvident and given to procrastination and would not have recourse to vaccination *in time.*

It was very painful to witness the amount of superstition and ignorant prejudice among the Pársís during the last year in connection with small-pox. One could easily conceive that the Pársí mind, true to the laws of its own nature, would, during the prolonged, constant, and intimate contact with the Hindús, appropriate to a certain extent their manners and customs, and even imbibe their superstitions and prejudices; but that the present state of enlightenment and education of the Pársís, at least of Bombay, should have tolerated this for a moment, is what I could not possibly believe : yet to my amazement the fact was there, in all its strangeness, that the Pársís even out-hindued the Hindús themselves in their superstitious regard for small-pox. Whatever influence enlightenment and education may have had upon the male portion of the Pársí community, there can be no denying the fact that their females continue to be as ignorant and superstitious as ever ; and, what is worse, the males invariably succumb to their influence, which is paramount in these cases.

The same is the case with the Mahomedans; with this difference, perhaps, that they have not much enlightenment or education to show, and, as a natural consequence, the males and females are in the same boat.

The case of the Kolís or fishermen, though painful in the extreme, is a different one altogether. Whether for weal or for woe they will stick to their dread deity "Devi;" and rather than deprive her of the victim of her choice, and try to thwart her operations, they would see every child of theirs in the grave. Wherever they are, they have to a soul consistently persisted in having nothing whatever to do with vaccination. It is true that they are doubly mischievous. They not only set a bad example to their ignorant and equally superstitious neighbours, but actually, like the " dog in the manger," do not allow others the opportunity of availing themselves of the benefits of vaccination. In the Kolíwádá of the Mándví district, though there were but five deaths among the Kolís, there were no less than 20 deaths in the other residents, of whom 18 were Hindús and 2 Christians. They, however, do not care to know what the result of their reprehensible conduct is either to themselves or to their neighbours.

Extent of Operations.

17. Speaking of the extent of the operations of the Vaccine Department generally the Native Town, Fort included, though a extensive and well-stocked field, is not the one that even its relative amount of benefit from vaccination. Our work is complete—as complete as circumstances permit—in the outlying suburban districts of the island, Kolábá, Chawapátí, Wálkeshwar, Máhálakshumí, Warlí, Máhim, Seo, Shiwrí, Tádwádí, and the places where vaccination is thorough ; and yet even here each place has some disturbing influence or other of its own which, more or less, mars the perfectness of the general result. Kolábá has its Kolíwádá ; and a portion of the residents of Lower Kolábá who, filled with a conceit regarding their position, think it a glory to be able to prevent the Vaccine Establishment from bringing their children to the vaccine stations to be vaccinated. Chawapátí, Wálkeshwar, and Máhálakshumí are generally inhabited by Konkaní Hindús, Málwanís and others, who are particularly migratory, leaving Bombay perhaps when vaccine operations are being carried on among them, and returning with unprotected persons in the very midst of the small-pox season,—mayhap with the germs of the disease itself with them. A little procrastination completes the work. At Máhálakshumí, and some other places, there is another counteracting influence at work. Here the people live in Wádís, and garden bungalows, that are scattered all over in the capacity of Málís and other menial servants ; and their Pársí masters, in asserting for their servants the liberty of the

subject, make a questionable use of their position in preventing the children of their servants being taken to the stations to be vaccinated. But the upshot is, that they are either surprised by small-pox, or get their children vaccinated when it too late to be of any use. Máhálakshumí had its quota of deaths from small-pox from among the Pársís even. At Warlí there is a Kolíwádá. At Máhim there is a small part of it called Bhandárwádá, lying on the main road, solely occupied by Bhandárís or toddy-drawers. These Bhandárís have always tried their best to resist our attempts at vaccinating them or their children ; and though there was a mortality of only 22 in the whole of Máhim, some 10 deaths of these were among these Bhandárís of this limited spot. In Máhim we have, too, a number of the Konkaní-Málwání Hindús so prone to migrate. In the Seo district we have two Kolíwádás—the Seo and Mázagaon ones. In Shíwrí there is one Kolíwádá, and the greater number of the deaths from small-pox of that district during the past year were among the Kolís and two or three in Hindús residing among them. The Jamshetji Jijíbhái Hospital being situated in the Tádwádí district all deaths from small-pox that take place there are credited to this locality, which consequently shows a disproportionately large mortality from small-pox. During the past year 31 persons died from small-pox in that hospital.

There is one particular locality of Bombay which, owing to peculiar circumstances of its own, allows of our work being almost exhaustive, and the result, too, is satisfactory. I allude to the Esplanade. In this district 436 persons were primarily vaccinated, and there were only three deaths from small-pox during the whole year—two in infants under one year of age and one in a child some eight or nine years old.

18. The following table shows the percentage of population of the different districts, and the percentage of successful primary operations therein in the years 1871-72 and 1872-73 :—

[*Table*

Total Population. Successful Primary Operations. 1871-72...10,338. 1872-73...12,343.	Kolábá.	Fort.	Esplanade.	Market.	Mándvi.	Chakhlá.	Umbarkhádi.	Dongari.	Dhobi Talao.	Phanaswádi.	Bhuleshwar.	Khára Talao.	Kumbhárwádá.	Khetwádi.	Girgaum.	Chawpáti.	Wálkeshwar.	Málabárhill.	Mázagaon.	Tádwádi.	Kámáthipurá.	Byculla.	Parel.	Shiwri.	Seo.	Máhim.	Warli.	Water Division.	Outstation.
Per cent. of Population.....	2·58	4.97	1·64	6·70	5·45	5·70	7·73	3·97	5·88	3·22	5·59	3·67	4·28	3·29	3·85	1·17	1·20	0·67	3·25	1·57	7·29	4·35	2·14	0·70	1·79	2·23	1·56	3·56	..
Per cent. successful 1871-72...	1·72	3·38	2·36	6·98	4·22	3·60	4·60	7·06	6·32	2·35	2·43	2·38	1·88	7·46	6·72	1·90	2·95	1·16	4·04	0·93	9·58	2·39	4·90	1·45	4·36	2·11	0·39	0·28	0·10
Per cent. successful 1872-73 ..	1·75	3·42	2·77	6·49	3·06	3·37	5·38	6·48	7·39	2·59	4·63	4·76	2·65	7·76	4·80	0·90	1·51	2·68	2·62	0·64	7·54	2·64	3·84	1·71	2·32	4·24	1·36	0·08	0·62

It has been frequently remarked that when small-pox makes its appearance in Bombay as an epidemic, it is seen to prevail in all its parts, in its entire extent, almost simultaneously. Nor is there any wonder that this is so. Insularly placed as Bombay appears to be, in the daily course of events it becomes connected with more parts of the world than any other place in India, inland or on the sea coast. During the last year, of those that died from small-pox alone, some 26 persons brought the disease into Bombay from ten outstations, and introduced it into 13 different localities, comprising almost the entire length and breadth of the island. The same thing must be taking place year after year.

Conduct of the Subordinates.

19. The conduct of the subordinates has been good.

Byculla, 10*th June* 1873.

KUTCH CIRCLE.

One Native Superintendent, and 9 Native States Vaccinators, under Mr. DORA'BJI HORMASJI', G.G.M.C.

Population 148,402. Total cost, Rs. 2,188-10. Average cost of each successful vaccination, Rs. 1-3-5.

Years.	Total vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those unknown from the total.	
		Increase.	Decrease.		In Primary Vaccination.	In Re-vaccination.
1871-72 ...	1,706	.....	.....	1,563	94·4	64·0
1872-73 ...	1,932	226	.....	1,791	94·3	88·8

1. During the year 1872-73 there were 1,932 vaccine operations performed, of which 1,791 cases were successful, 108 were unsuccessful, and 33 did not come under observation after being vaccinated. Of the cases vaccinated there were 1,036 males and 896 females; there were 1,327 Hindús, 599 Musalmáns, and 6 Pársís.

2. I am glad to observe that vaccination is gaining a better footing every year. This year there were performed 226 operations more than those of the last. In order to give an idea of the progress made during the last successive five years I here annex a table:—

Years.	Total number vaccinated.	Excess over 1868.
1868	624	
1869-70	610	
1870-71	648	24
1871-72	1,706	1,082
1872-73	1,932	1,308

The increased number of operations performed during the last two years was in consequence of the assistance obtained from the Acting Political Agent, Colonel S. C. Law,

who exercised his influence in inducing the Judejás to appoint their own vaccinators, and thus four vaccinators were added to the number of five who were already maintained by His Highness the Ráo. Although the work performed by the Judejá vaccinators was only to a limited extent, yet their appointment freed the Darbár vaccinators to work exclusively in the Darbár towns, and thus more work was done by them than in former years.

3. This year there were nine vaccinators at work. His Highness was pleased to increase their number from four to five. The Chief of Terá and the Judejás of Rohá, Berájá and Mothárá had each one of their own.

Vaccination in the Darbár towns was performed as follows:—

Bhúj Dispensary	...	162
Mándví do.	...	138
5 Vaccinators.	...	1,194
	Total	1,494

In the Bháyád or Judejá towns as follows:—

Terá	... ...	26
Rohá	... ...	217
Berájá	... ...	111
Mothárá	... ...	84
	Total	438

The above figures at once point out the difference in vaccination in the Darbár and Bháyád towns. The result of 26 persons vaccinated at Terá, during the year round, is very poor indeed.

4. I am sorry to observe that the Bháyáds show great apathy for vaccination. In the beginning of the year, while Colonel Law was away on furlough, they kept the work at a standstill. It was again put in motion by Captain G. R. Goodfellow, the present Acting Political Agent, by stirring them up sharply. As the Agent takes a good deal of interest in the matter, I have every hope of vaccination making further progress during the next year by his keeping a constant eye over the Bháyád vaccinators, and increasing their number wherever possible.

5. Percentage of successful cases in primary vaccination, excluding those unknown from the total, was 94·3.

6. The cost of each successful case was Rs. 1-3-5.

7. As the people of Kutch are so much against vaccination, it was found very difficult to get cases for re-vaccination. There were only six cases at Bhúj and three at Mándví which were re-vaccinated, and are included in the total number of vaccinations given above.

Re-vaccination.

8. The lymph used was from arm to arm, and was exceedingly good throughout the year. There are no signs yet of its failing.

Lymph.

Bhúj, 1st April 1873.

TABLES

OF

VACCINATION RETURNS, &c.,

FOR

1872-73.

A.—VACCINE DEPARTMENT.

STATEMENT No. I., showing particulars of Vaccination in each Circle of Superintendence, in the Bombay Presidency, during the Year 1872-73.

1	2	3	4	5		6		7	8	9																		10				11		12
										Primary Vaccinations.																		Re-vaccinations.				Percentage of successful cases, excluding those "Unknown" from the Total.		Average Number of Persons vaccinated by each Vaccinator.
										A.		B.					C.	D.			E.													
										Sex.		Caste.					Age.	Results.																
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.		Number of Vaccinators.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Name of portion of District or of Town.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársí.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	A.	B.	C.	D.	In Primary Vaccination.	In Re-vaccination.	
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.																											
CIRCLE	Acting—JOHN ROBB, M.B., Assistant Surgeon.																																	
		1	1	1	1	3,147	3,208	Púná Collectorate.	Hawelí	1,583	1,560	..	2,811	46	..	286	952	2,191	3,087	85	56	3,228	1	..	3	4	97·3	100·0	3,147
				2	2	1,759	2,267		Púná City	925	767	56	1,325	165	9	147	1,095	597	1,259	53	381	1,693	18	37	12	67	95·9	32·7	879
				1	1	1,932	1,168		Máwal	1,030	902	..	1,660	12	..	260	287	1,645	1,531	81	325	1,937	..	..	..	..	94·9	..	1,932
				2	2	1,884	1,021		Khed	939	945	..	1,673	41	..	170	949	935	1,777	36	71	1,884	..	..	..	..	98·0	..	942
		1	1	2	1	912	817		Juner	437	475	..	811	27	..	74	182	730	585	146	193	924	..	..	..	..	80·0	..	456
				1	1	2,049	1,991		Purandhar	1,069	980	..	1,846	27	..	176	807	1,242	2,002	12	35	2,049	..	..	..	..	99·4	..	2,049
				1	1	1,035	1,225		Sirúr	567	468	4	838	57	..	136	320	715	886	71	83	1,040	..	..	..	..	90·4	..	1,035
				1	1	940	1,372		Indápur	477	463	..	845	45	..	50	298	642	687	162	134	983	..	..	..	..	80·9	..	940
				2	2	1,428	1,369		Bhimthadí	740	688	..	1,154	52	..	222	503	925	1,172	70	205	1,447	..	..	..	..	94·3	..	714
		1	1	13	12	15,086	14,438			7,767	7,248	60	12,963	472	9	1,511	5,393	9,622	12,986	716	1,481	15,183	19	37	15	71	94·7	33·9	1,160
				2	2	3,482	3,531		Nagar	1,838	1,640	33	2,599	370	6	470	1,352	2,126	3,255	96	155	3,506	4	..	..	4	97·1	100·0	1,741
				1	1	988	2,216		Ráhurí	493	494	...	790	57	..	140	459	528	853	47	103	1,003	..	1	..	1	94·7	..	988
				1	1	959	369		Párner	450	509	1	808	39	..	111	221	738	903	34	22	959	..	..	..	..	96·3	..	959
		1	1	1	1	1,405	1,401	Ahmadnagar Collectorate.	Srígundí	722	683	4	1,250	51	..	100	320	1,085	1,309	44	69	1,422	..	..	..	..	96·7	..	1,405
				1	1	1,643	204		Karjat	868	775	..	1,440	55	..	148	608	1,035	1,576	45	66	1,687	..	..	..	..	97·2	..	1,643
				1	1	1,854	872		Newásá	967	878	13	1,519	108	..	205	621	1,224	1,690	124	155	1,879	5	2	2	9	92·8	71·4	1,854
				1	1	1,542	793		A'nkolá	778	762	..	1,458	9	..	73	265	1,275	1,254	26	281	1,561	..	..	2	2	97·9	..	1,542
				1	1	1,975	393		Jámkhed	974	1,001	..	1,767	123	..	85	302	1,673	1,793	168	43	2,004	..	..	..	..	91·4	..	1,975
				1	1	913	1,532		Kopargáon	451	462	..	827	26	..	60	376	537	867	23	25	915	..	..	..	..	97·4	..	913
				1	1	1,210	1,628		Sangamner	588	622	1	1,120	29	..	60	610	600	1,038	72	116	1,226	..	..	..	..	93·5	..	1,210
				1	1	1,103	339		Siogáon	585	517	..	915	80	..	107	152	950	999	28	77	1,104	1	..	..	1	97·2	100·0	1,103
		1	1	12	12	17,074	13,318			8,714	8,343	52	14,493	947	6	1,559	5,286	11,771	15,447	707	1,112	17,266	10	3	4	17	95·6	76·4	1,422
				1	1	402	706		Násik	178	224	1	329	7	..	65	117	285	338	20	45	403	..	..	..	..	94·4	..	402
				1	1	693	475		Násik City	324	343	33	548	75	..	11	231	436	553	25	90	668	9	15	2	26	95·6	37·5	693
				1	1	1,587	728		Igatpurí	804	780	2	1,458	8	..	116	103	1,481	1,363	144	134	1,641	2	1	..	3	90·4	46·2	1,587
				1	1	820	907		Niphád	406	413	..	747	26	..	46	320	499	717	125	16	858	1	..	..	1	85·1	100·0	820
				1	1	828	1,671		Chándúr	472	353	..	797	13	..	15	414	411	780	27	41	848	..	1	2	3	93·6	..	828
		1	1	1	1	981	975	Collectorate.	Sinnar	486	495	..	896	24	..	61	463	518	726	149	117	992	..	..	..	..	82·9	..	981
				1	1	1,944	2,145		Máligám	1,004	940	..	1,719	89	..	136	764	1,180	1,759	48	185	1,992	..	..	..	..	97·3	..	1,944

			1	1	1,237	2,324	Násik	2,620	96,034	Báglán	629	598	..	1,189	14	..	34	391	846	1,221	33	6	1,260	..	..	..	..	97·3	..	1,237
			1	1	485	376		1,404	26,305	Nándgám	238	246	..	450	32	..	2	75	409	313	38	145	499	..	1	..	1	89·2	..	485
			1	1	618	347		480	70,522	Sáwargáon	302	316	..	558	20	..	45	305	313	448	100	70	618	..	..	..	..	81·7	..	618
			1	1	1,529	928		560	63,105	Dindorí	796	733	..	1,505	9	..	15	350	1,179	1,506	18	20	1,544	..	..	..	..	98·8	..	1,529
1	1		11	11	11,124	11,582		9,668	663,036		5,649	5,441	36	10,191	317	..	546	3,533	7,557	9,727	727	869	11,323	12	18	4	34	93·0	40·0	1,011
			2	2	3,420	3,927	Sholápur Collectorate.	817	127,184	Sholápur	1,774	1,645	5	2,408	594	..	412	1,744	1,675	2,811	348	383	3,542	..	1	..	1	88·9	..	1,710
			1	1	1,189	1,876		599	98,727	Mádhe	595	593	..	1,043	63	5	77	714	474	967	165	60	1,192	..	1	..	1	85·4	..	1,189
1	1		1	1	2,003	1,300		721	98,532	Karmálá	890	1,113	..	1,870	71	..	62	187	1,816	1,847	83	73	2,003	..	..	..	..	95·7	..	2,003
			2	2	2,609	2,415		427	55,368	Pandharpur	1,321	1,283	..	2,185	141	..	278	1,152	1,452	2,116	85	416	2,617	1	..	4	5	96·1	100·0	1,804
			1	1	837	854		621	57,849	Sángolá	385	450	..	746	27	..	62	367	468	633	108	119	860	2	..	..	2	85·4	100·0	837
			2	2	1,595	2,820		569	105,011	Bársi	799	796	..	1,408	99	..	88	907	688	1,227	113	268	1,608	..	..	..	..	91·5	..	797
1	1		9	9	11,653	13,192		3,754	542,671		5,764	5,880	5	9,660	995	5	979	5,071	6,573	9,601	902	1,319	11,822	3	2	4	9	91·4	60·0	1,294
			2	2	2,685	3,625	Khándesh Collectorate.	759	66,607	Dhúliá	1,357	1,293	7	2,132	213	..	298	1,276	1,374	2,645	42	..	2,687	35	..	..	35	98·4	100·0	1,342
			1	1	1,366	1,657		874	123,357	Sáwadá	673	687	..	1,212	81	..	67	974	386	1,156	117	130	1,403	1	5	..	6	90·8	16·6	1,366
			1	1	1,146	501		323	59,783	Nasirábád	550	576	2	1,004	67	..	53	576	550	990	29	107	1,126	7	8	5	20	97·1	46·6	1,146
			1	1	2,669	1,553		459	76,815	Irandol	1,385	1,264	..	2,467	157	..	25	833	1,816	2,611	17	21	2,649	19	..	1	20	99·3	100·0	2,669
			1	1	2,161	1,334		518	69,768	Jáuner	1,058	1,061	..	1,838	101	..	180	710	1,409	2,100	25	16	2,141	38	2	2	42	98·8	95·0	2,161
			1	1	809	1,113		762	34,212	Sherpur	365	415	..	751	29	..	..	161	619	793	149	..	942	29	..	..	29	84·1	100·0	809
			1	1	956	425		474	40,228	Sháháde	462	494	..	917	10	..	29	131	775	884	57	72	1,013	..	..	..	..	93·9	..	956
1	1		1	1	246	281		1,286	34,133	Talode	141	105	..	244	2	..	..	10	236	168	36	54	258	..	..	..	..	82·6	..	246
			1	1	1,314	508		640	44,945	Nandurbár	658	656	..	1,170	87	..	57	451	863	1,149	134	77	1,360	..	..	..	..	89·5	..	1,314
			1	1	1,260	2,165		449	43,985	Chálisgáon	610	650	..	1,200	34	..	26	189	1,071	1,074	48	165	1,287	..	..	..	..	95·7	..	1,260
			1	1	1,992	545		1,234	59,327	Pimpalner	928	934	..	1,824	38	..	..	573	1,289	1,831	60	6	1,897	25	5	10	40	96·8	83·3	1,992
			1	1	860	1,046		539	85,173	Páchorá	458	402	..	802	26	..	32	216	644	804	34	26	864	..	..	..	..	95·9	..	860
			1	1	1,819	1,673		504	50,371	Chopde	878	895	..	1,599	78	..	96	484	1,289	1,659	68	64	1,791	16	27	3	46	96·0	37·2	1,819
			1	1	1,489	1,554		538	78,910	Amalner	744	745	..	1,236	96	..	157	312	1,177	1,388	123	103	1,614	..	..	..	..	91·8	..	1,489
			1	1	2,171	2,541		506	65,970	Virdal	1,016	997	..	1,256	23	..	734	277	1,736	1,770	63	233	2,066	52	4	102	158	96·5	92·8	2,171
			1	1	1,099	651		566	83,671	Bhosáwal	554	545	..	999	52	..	48	876	223	974	64	61	1,099	..	..	..	..	93·8	..	1,099
1	1		17	17	23,952	21,662		10,431	1,023,255		11,837	11,719	9	20,651	1,094	..	1,802	8,099	15,457	21,996	1,066	1,135	24,197	222	51	123	396	95·3	81·3	1,408
			2	2	4,616	3,272	Sátárá Collectorate.	432	102,736	Sátárá	2,347	2,235	18	4,040	166	...	358	1,495	3,087	4,273	175	220	4,668	15	11	10	36	96·0	57·6	2,308
			1	1	1,768	2,517		403	14,568	Tásgáon	929	839	..	1,497	105	..	166	1,100	668	1,234	88	446	1,768	..	..	..	..	93·3	..	1,768
			1	1	1,897	2,170		896	53,870	Jáwalí	991	906	..	1,685	57	..	157	115	1,782	1,897	..	..	1,897	..	..	..	..	100·0	..	1,897
			1	1	2,346	1,216		802	82,357	Wái	1,218	1,103	..	1,972	81	..	273	848	1,478	2,039	130	200	2,369	14	4	2	20	94·0	77·7	2,346
			1	1	1,459	1,413		840	77,051	Khatáv	730	727	..	1,278	33	..	146	371	1,086	1,330	67	66	1,457	..	2	..	2	95·2	..	1,459
1	1		2	2	4,912	2,623		720	77,750	Wálwá	2,591	2,350	..	4,308	93	..	540	965	3,976	4,554	26	366	4,946	1	..	..	1	99·4	100·0	2,471
			1	1	910	1,421		632	62,564	Mán	457	453	..	753	12	..	145	335	575	643	174	102	919	..	..	..	..	78·7	..	910
			2	2	3,462	3,578		487	121,694	Karhád	1,843	1,619	..	3,093	119	..	245	818	2,644	2,614	142	720	3,476	..	..	..	..	94·3	..	1,791
			2	2	1,888	2,206		720	77,750	Khánápur	980	858	..	1,584	94	..	164	944	864	1,255	332	330	1,917	..	..	..	..	79·9	..	919
			1	1	2,578	1,971		810	97,485	Pátan	1,341	1,231	..	2,277	22	..	276	347	2,228	2,269	79	230	2,578	..	2	1	3	99·6	..	2,578
			2	2	2,007	2,072		584	53,583	Malsiras	1,077	1,013	..	1,827	73	..	190	1,180	910	1,720	179	279	2,173	3	2	2	7	90·5	66·6	1,048
			1	1	1,704	2,087		350	71,974	Kwegáon	947	857	..	1,454	43	..	207	612	1,092	1,279	13	414	1,706	..	..	..	..	98·4	..	1,704
1	1		17	18	29,617	23,016		7,673	893,685		15,351	14,199	18	25,771	898	..	2,863	9,130	20,420	25,107	1,405	3,367	29,879	33	21	15	69	94·7	61·1	1,742
			1	1	1,548	1,592	Native States.	420	61,000	Akalkot	828	720	..	1,219	220	..	109	565	983	1,293	144	154	1,591	..	..	..	..	88·9	..	1,548
			1	1	[illegible]	[illegible]		900	26,187	Peuth	285	249	..	530	3	..	1	213	321	560	93	2	595	..	..	..	..	93·6	..	554
			1	1	1,083	1,063		1,040	113,729	Bhor	560	563	..	1,011	23	..	49	111	942	1,054	3	26	1,083	..	..	..	..	99·7	..	1,083
			1	1	771	945		1,620	58,845	Jat	382	288	..	671	56	..	44	340	431	746	18	7	771	..	..	..	..	97·6	..	771
			1	1	736	747		266	58,980	Aundh	354	376	..	653	35	..	45	148	582	712	10	18	740	..	..	..	..	98·6	..	730
			1	1	965	1,002		512	49,714	Phaltan	498	465	..	764	32	..	167	506	457	615	136	275	1,026	2	..	..	2	87·8	100·0	965
..	..		6	6	5,941	6,184		4,822	564,035		2,928	2,701	..	4,848	369	...	412	1,913	3,716	4,920	404	482	5,806	2	..	..	2	92·4	100·0	938
Total for the Central Circle	6	6	85	85	1,14,127	106[illegible]		47,266	5,124,924		58,010	55,581	189	98,577	5,092	20	9,672	38,427	75,116	99,784	5,927	9,765	1,15,476	501	132	165	598	94·3	69·5	1,342

1	2	3		4		5		6	7	8	9												10				11		12
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.		Number of Vaccinators.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Square Miles.	Population of Area included in last column.	Name of portion of District or of Town.	PRIMARY VACCINATIONS.											RE-VACCINATIONS.				Percentage of successful cases, excluding those "Unknown" from the Total.		Average Number of Persons vaccinated by each Vaccinator.
												A. SEX.		B. CASTE.					C. AGE.		D. RESULTS.			E.	A.	B.	C.	D.			
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.					Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccination.	In Re-vaccination.	
				1	2	1,528	3,091		604	102,344	Belgáum	685	574	63	957	78	3	158	507	752	1,052	146	66	1,264	104	164	1	269	87·8	38·8	1,528
				1	1	543	604		..	26,947	BelgáumTown	261	258	11	379	85	1	43	246	273	439	62	25	526	9	15	..	24	87·6	37·4	543
				1	1	1,731	1,392		409	131,504	Sampgáon ...	880	335	1	1,363	264	..	87	362	1,353	1,496	242	87	1,825	2	13	1	16	86·0	13·5	1,731
		1	1	1	1	1,241	1,113		638	120,691	Parasgarh....	678	560	..	1,148	88	..	2	248	990	1,036	167	102	1,307	3	..	..	3	85·9	100·0	1,241
				1	1	1,770	1,752		663	97,085	Gokák	954	816	..	1,650	119	..	1	1,311	459	1,684	135	64	1,883	..	..	..	..	92·5	..	1,770
				1	..	31	..		..	12,612	Gokák Town..	16	15	..	23	8	..	..	12	19	27	3	1	31	..	..	..	..	92·3	..	31
				2	1	2,123	1,202		848	243,635	Chikodi	1,098	1,025	..	1,813	201	..	109	304	1,819	1,865	155	106	2,126	..	..	..	..	87·0	..	1,061
				1	1	1,744	2,163		632	78,375	Bidi	907	833	59	1,529	60	..	92	511	1,229	1,358	202	309	1,869	..	1	3	4	89·2	..	1,744
				1	2	576	1,001		789	114,677	Athní	270	305	..	527	32	..	16	232	343	415	50	110	575	1	..	..	1	90·0	100·0	576
		1	1	10	10	11,287	12,323	Belgáum Collectorate.	4,588	933,420		5,749	5,221	134	9,389	935	4	508	3,733	7,237	9,372	1,164	870	11,406	119	193	5	317	88·9	38·1	1,128
				1	2	2,146	2,069		428	111,726	Dhárwád	1,064	1,051	15	1,673	344	..	83	545	1,570	1,579	259	307	2,145	5	33	4	42	85·9	13·1	2,146
				1	1	937	1,221		567	97,706	Nawalgund ...	506	451	..	850	107	..	..	229	728	740	78	177	995	..	..	..	..	90·4	..	957
				1	1	1,618	1,374		341	76,999	Bankápur	860	749	2	1,365	237	..	14	133	1,485	1,546	53	54	1,653	..	..	..	..	96·6	..	1,618
				1	1	1,331	1,388		295	62,879	Hángal	686	630	..	1,013	290	..	13	89	1,227	1,214	114	48	1,376	7	10	..	17	91·4	41·4	1,331
				1	1	1,078	1,559		310	94,847	Hubli	539	539	3	941	111	..	23	259	819	905	101	98	1,104	..	..	..	..	89·9	..	1,078
		1	1	1	1	1,167	807		..	34,793	Hubli Town...	608	557	17	772	366	1	9	251	914	1,027	86	59	1,172	2	..	..	2	92·2	100·0	1,167
				1	1	332	610		403	68,845	Ránibadnúr ...	195	137	..	266	65	..	1	3	329	309	12	11	332	..	..	..	..	96·2	..	332
				1	1	1,161	1,271		403	62,804	Kod	639	522	..	1,001	125	..	35	103	1,058	1,112	31	25	1,168	..	..	..	..	97·2	..	1,161
				1	1	737	1,172		408	83,010	Karajghí	442	290	..	601	103	..	28	14	718	646	86	5	737	3	2	..	5	88·2	60·0	737
				1	1	1,046	1,160		324	45,375	Kalghatghí ..	541	500	13	828	130	..	70	301	740	916	72	81	1,069	1	2	2	5	92·7	33·3	1,046
				1	1	231	559		366	64,640	Ron	127	104	..	206	25	..	..	46	185	166	54	15	235	..	..	..	..	75·4	..	231
				2	2	1,513	1,282		697	107,777	Dambal	760	753	3	1,298	180	..	32	247	1,266	1,286	80	189	1,555	..	..	..	..	94·1	..	756
		1	1	13	13	13,317	14,472	Dhárwád Collectorate.	4,542	918,434		6,976	6,283	53	10,814	2,083	1	308	2,220	11,039	11,446	1,026	1,069	13,541	18	47	6	71	96·5	27·6	1,024
				1	1	1,563	1,263		230	43,011	Kárwár	793	712	115	1,316	55	..	19	103	1,402	1,390	113	21	1,524	18	35	5	58	92·4	33·9	1,563
				2	1	1,704	1,267		492	87,252	Koomptá	848	782	2	1,472	15	..	141	144	1,486	1,537	113	..	1,650	56	18	..	74	93·1	75·6	852
		1	1	2	2	2,386	2,124		426	85,147	Honáwar	1,254	987	35	1,994	87	..	125	108	2,133	1,921	288	42	2,251	82	59	4	145	86·9	58·1	1,193
				1	1	680	865		522	51,366	Sirsí	354	284	..	605	1	..	32	4	634	442	88	126	656	17	10	15	42	83·3	62·9	686
				1	2	1,042	347		617	28,776	Ilápur	500	437	10	903	10	..	9	51	886	814	36	92	942	77	19	9	105	95·7	30·2	1,042
				1	2	1,422	586		227	32,601	Siddápur	754	656	..	1,269	6	..	135	75	1,335	1,294	88	28	1,410	8	4	..	12	93·6	66·6	1,422
				1	1	903	1,223		1,023	46,627	Haliál	477	423	54	746	50	..	50	133	767	710	158	32	900	3	..	..	3	81·7	100·0	903
		1	1	9	8	9,700	7,675		3,537	374,780		4,980	4,281	216	8,310	224	..	511	618	8,643	8,108	884	341	9,333	261	145	33	439	90·1	64·2	1,077
				2	2	1,344	2,127		684	103,593	Bágalkot	720	618	..	1,117	173	..	48	424	914	1,020	79	263	1,362	2	..	4	6	92·8	100·0	672
				1	1	714	883		..	6,592	Kaládgi Town.	311	293	1	481	69	..	53	130	474	559	59	26	644	52	31	27	110	90·4	62·6	714
				1	1	1,834	1,019		518	105,866	Hunugundá ..	961	870	..	1,451	148	..	232	127	1,704	1,812	88	19	1,919	3	..	..	3	95·3	100·0	1,834
				1	1	613	362		756	93,738	Bágewádi	319	294	..	443	148	..	24	94	519	487	74	65	626	..	..	..	..	86·8	..	613
				1	1	1,424	1,913		689	130,816	Badámí	743	681	..	1,344	62	..	18	276	1,148	1,413	30	11	1,454	..	..	..	..	97·9	..	1,424

Acting—H. A. LEWIS, Surgeon.

SOUTHERN CIRCLE.

J. RABY, Assistant Surgeon.

			1	1	929	1,112	Ka-	552	83,843	Mudebihál....	457	472	..	774	93	..	62	195	734	631	109	208	939	..	..	..	..	86·3	..	929
			1	1	763	756		837	105,475	Indi	414	348	..	655	95	..	12	101	661	553	87	158	798	..	1	..	1	86·4	..	763
			1	1	841	1,117		792	99,798	Sindghí	410	431	..	695	102	..	44	176	665	758	23	66	847	..	..	..	..	97·0	..	841
			2	2	1,755	1,417	Collec-	865	86,311	Bijápur	918	823	..	1,428	275	..	38	481	1,260	1,494	120	128	1,742	6	5	3	14	92·5	54·5	877
	1	1	11	11	10,217	10,771			5,693	816,037		5,253	4,830	1	8,388	1,163	..	531	2,004	8,079	8,727	660	944	10,331	63	37	34	134	92·9	65·0	928
			1	1	812	646		1,207	223,663	Sánglí.....	437	375	..	702	110	..	..	551	261	618	101	106	825	..	..	..	..	85·9	..	812
			1	1	672	1,035		574	82,201	Miraj, 1st	375	297	..	465	207	..	..	514	158	669	1	2	672	..	..	..	..	100·0	..	672
			1	1	559	393		197	35,601	Do. 2nd	372	187	..	534	25	..	..	307	252	559	..	..	559	..	..	..	..	99·8	..	559
			1	1	462	585		271	39,420	Kurandwád 1st.	223	239	..	348	81	..	33	199	263	439	25	7	471	..	..	..	..	84·6	..	462
			1	1	467	387		177	30,251	Do. 2nd	253	213	..	397	33	..	36	79	387	424	24	26	474	1	..	..	1	84·6	100·0	467
			1	1	913	1,539		317	58,921	Mudhol	496	417	..	837	76	..	..	..	913	452	432	29	913	..	..	..	..	51·1	..	913
			1	1	467	1,138		189	38,031	Rámdrug	204	200	..	364	40	..	..	100	304	343	38	23	404	17	36	10	63	90·0	30·9	467
			2	2	1,090	827		Unkn.	102,346	Jamkhandí ..	577	513	..	932	147	..	11	431	659	330	221	628	1,179	..	..	..	..	59·8	..	545
			1	1	515	312		Unkn.	Unkn.	Sávanúr.....	260	253	1	352	157	..	3	46	467	467	53	10	580	2	..	..	2	89·8	100·0	515
	..	..	10	9	5,957	6,916			2,932	610,434		3,197	2,694	1	4,931	876	..	83	2,227	3,664	4,301	895	831	6,027	20	36	10	66	82·7	35·7	595
			1	1	2,070	1,744		360	32,414	Vishálgarh ...	1,059	1,007	..	1,824	86	..	156	445	1,621	2,008	40	21	2,069	4	..	..	4	98·4	100·0	2,070
			1	1	1,777	1,224		567	59,330	Ichalkaranjí..	894	883	..	1,458	89	..	230	774	1,003	1,482	65	256	1,803	..	..	..	..	95·7	..	1,777
			1	1	1,911	1,467		252	47,801	Kágal.....	954	927	3	1,695	18	..	195	543	1,368	1,660	38	216	1,914	..	..	..	..	97·7	..	1,911
			1	1	1,458	1,185		486	128,204	Gadhingiaj ..	780	678	8	1,373	59	..	18	98	1,360	1,285	134	50	1,469	..	..	..	..	90·5	..	1,458
			1	1	1,271	863		486	43,439	Báurá.....	586	579	..	951	145	..	69	146	1,019	1,106	35	62	1,203	33	6	67	106	96·9	84·6	1,271
	1	..	1	1	2,535	1,595		540	106,714	Panálá	1,260	1,265	..	2,278	16	..	231	540	1,985	2,517	16	8	2,541	9	..	1	10	99·3	..	2,535
			1	1	2,313	1,000		900	91,148	Buthargarh ..	1,180	1,133	9	2,146	48	..	110	263	2,050	2,003	154	156	2,313	..	..	..	..	92·8	..	2,313
			1	1	976	1,166		243	79,722	Shirol.....	490	486	..	816	68	..	92	646	330	808	40	153	1,001	..	..	..	..	95·2	..	976
			1	1	325	636		180	84,464	Torgal	160	165	..	294	26	..	5	94	231	297	21	17	335	..	..	..	..	93·3	..	325
			1	1	1,132	1,143		598		Ajrá	576	556	8	1,017	27	..	80	446	686	1,111	44	19	1,174	..	..	..	..	96·1	..	1,132
			1	1	3,777	3,345		506	129455	Kolhápur Pethá & Station.	1,737	1,600	1	2,924	136	..	276	879	2,458	2,891	194	271	3,356	321	102	17	440	93·7	75·4	3,777
	1	..	11	11	19,545	15,530			5,118	802,691		9,706	9,279	29	16,776	718	..	1,462	4,874	14,111	17,168	781	1,229	19,178	367	103	85	560	90·0	77·2	1,776
Grand Total of the Southern Circle.	5	4	64	62	70,013	67,627			26,410	4,455,796		35,861	32,588	434	58,608	5,999	5	3,403	15,676	52,773	59,122	5,410	5,284	69,816	848	566	173	1,587	91·6	59·9	1,094

WESTERN CIRCLE.

T. CODY, Assistant Surgeon.

			1	2	1,098	1,992		288	79,025	Shástí.....	556	540	248	771	23	4	50	409	687	1,051	13	32	1,096	2	..	..	2	98·7	100·0	1,098
			1		247			..	14,299	Thána City ..	134	108	17	195	6	7	17	79	163	206	30	9	245	1	4	..	5	87·2	20·0	247
			1	1	1,286	1,324		216	61,089	Bassein	669	613	154	1,101	6	1	20	628	654	1,271	18	1	1,290	..	4	..	4	98·6	..	1,286
			1	1	2,246	890		320	74,267	Bhiwandí	1,131	1,115	..	2,041	61	..	144	300	1,946	1,940	461	36	2,437	..	..	..	..	80·7	..	2,246
			1	1	1,138	1,672		579	72,556	Kalián	574	589	..	1,051	31	..	81	412	751	886	240	72	1,193	4	..	1	5	78·6	100·0	1,168
			1	1	1,076	1,999		636	110,423	Dhanú	557	514	..	957	..	114	..	186	885	969	100	11	1,080	5	..	..	5	90·6	100·0	1,076
	1	1	1	1	1,401	2,456		365	77,150	Karjat	693	703	1	1,224	20	..	151	569	827	1,301	76	31	1,408	5	..	..	5	94·4	100·0	1,401
			1	1	787	309		413	71,974	Máhim	413	370	..	776	..	..	7	272	511	738	30	20	789	2	2	..	4	96·0	50·0	787
			1	1	1,333	1,768		345	57,203	Murbád	674	657	..	1,298	29	..	4	332	999	1,030	98	205	1,333	..	2	..	2	91·3	..	1,333
			1		1,562			278	96,714	Panwel	765	797	..	1,469	35	..	53	1,020	542	1,392	52	118	1,562	..	..	..	..	96·3	..	1,562
			1	2	548	2,350		..		Panwel Town.	276	269	1	512	24	..	8	304	241	505	37	17	559	3	..	..	3	93·1	100·0	548
			1		313			..	8,690	Uran	175	137	13	277	13	1	8	132	180	239	23	63	325	..	1	..	1	91·2	..	313
			1	1	1,972	2,344		849	100,304	Sháhpur	1,038	934	..	1,871	35	..	66	214	1,758	1,860	113	7	1,980	..	..	..	..	94·2	..	1,972
			1	1	902	350		318	32,420	Wádá	439	463	..	660	13	..	229	122	780	713	176	23	912	..	..	..	..	80·2	..	902
	1	1	13	13	15,939	17,454			4,607	847,424		8,094	7,809	434	14,203	296	127	843	4,979	10,924	14,101	1,467	645	16,213	22	13	1	36	90·5	62·8	1,226
			1	1	1,739	1,522		192	66,947	Alíbág	915	824	4	1,637	44	2	52	688	1,051	1,709	16	32	1,748	..	..	..	..	99·0	..	1,739
			1	1	1,709	2,408		339	72,733	Mángaon	857	797	..	1,467	25	..	53	657	997	1,532	140	56	1,728	27	25	3	55	91·6	51·9	1,709
	1	1	1	1	1,138	1,744	Kolába Collectorate	455	105,336	Máhád	556	571	..	1,045	29	..	162	155	972	1,090	25	12	1,127	8	3	..	11	97·7	72·7	1,138
			1	1	2,232	1,844		296	63,363	Pen	1,190	1,026	..	2,043	44	..	129	1,145	1,071	2,130	72	37	2,239	7	9	..	16	96·7	43·7	2,232
			1	1	900	1,991		219	42,044	Rohá	431	447	..	787	24	..	67	473	405	814	44	23	881	19	2	1	22	94·8	90·4	909
	1	1	5	5	7,718	9,509			1,591	350,423		3,949	3,665	4	6,979	166	2	483	3,118	4,496	7,266	297	160	7,723	61	39	4	104	96·0	61·0	1,543

1	2	3		4		5		6		7	8	9														10				11		12
												PRIMARY VACCINATIONS.														RE-VACCINATIONS.				Percentage of successful cases, excludingthose "Unknown" from the Total.		Average Number of Persons vaccinated by each Vaccinator.
												A.	B.					C.	D.			E.										
												Sex.	CASTE.					AGE.	RESULTS.													
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.		Number of Vaccinators.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Square Miles	Population of Area included in last column.	Name of portion of District or of Town.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccination.	In Re-vaccination.	
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.																									
WESTERN CIRCLE—*continued.*	T. CODY, Assistant Surgeon.																															
		1	1	11	11	37,182	32,934		3,931	1,036,624		17,895	16,592	68	30,108	2,049	..	2,262	5,690	28,797	32,278	1,675	1,386	35,379	1455	850	390	2,695	95·0	63·1	3,380
				1	1	1,364	197	Native States.	150	71,996	Janjírá	679	678	..	1,191	138	..	28	129	1,228	1,086	59	214	1,359	1	6	..	7	94·8	14·2	1,364
		..	..	1	1	1,081	425		534	37,406	Jawár.....	559	522	..	1,037	3	..	41	137	944	1,065	1	15	1,081	..	..	..	..	99·9	..	1,081
				1	1	6,528	4,648		900	190,814	Sáwantwádi	2,720	2,772	120	5,256	116	..	..	1,066	4,426	5,278	344	20	5,642	779	243	14	1,036	93·8	76·2	6,528
		..	..	3	3	8,973	5,270		1,584	300,216		3,958	3,972	120	7,484	257	..	69	1,332	6,598	7,429	404	249	8,082	780	249	14	1,043	94·8	75·8	2,991
	Grand Total of the Western Circle.	3	3	32	32	69,312	65,167		11,623	2,534,687		33,896	32,038	626	58,774	2,768	129	3,637	15,119	50,815	61,074	3,843	2,440	67,357	2818	1151	409	3,878	94·0	66·8	2,181
CIRCLE.	COLA, M. D.	..	..	1	1	314	1,151	Pálanpur.	Unkn.	9,335	Dísá Camp....	163	137	9	189	82	6	14	204	96	256	20	26	302	9	5	..	14	92·7	64·2	314
		1	1	1	1	2,186	2,035	Ahmadábád Collectorate.	306	130,610	Daskroí	1,183	944	10	1,791	109	..	217	1,382	745	1,878	226	78	2,182	33	19	7	59	89·2	63·4	2,186
				2	2	4,913	5,098		2	116,873	Ahmádábád City.	2,263	2,141	11	3,070	1,077	26	220	2,811	1,593	4,250	119	107	4,476	401	102	15	518	97·2	79·7	2,456
				2	1	2,458	2,237		650	92,521	Dholká	1241	1,141	..	1,911	184	..	287	1,662	720	2,126	127	129	2,382	56	9	11	76	94·3	86·7	1,229
				1	1		490		..	20,854	Dholká Town.																			
		2	2	2	2	2,319	3,248		1,203	124,860	Dhandúká....	1,066	1,046	..	1,615	339	..	158	1,380	732	1,836	158	128	2,122	155	26	26	207	92·0	85·7	1,159
		2	1	2	1	2,931	2,492		655	108,383	Veramgáon ..	1441	1,352	..	2,407	102	1	193	2,006	787	2,567	81	185	2,833	78	24	26	128	96·9	76·4	1,465
				1	1		698		..	19,661	Veramgáon Town.																			
		1	1	1	1	1,503	1,290		356	73,229	Sánand	714	656	..	1,189	72	..	109	829	541	1,281	39	53	1,373	97	9	27	133	97·0	91·5	1,503
				1	1	1,377	997		446	106,934	Prántej	776	754	..	1,371	28	..	131	1,018	512	1,392	116	26	1,534	37	4	6	47	92·3	90·2	1,377
				1	1	2,241	742		223	33,329	Gogo	1,146	1,056	..	1,945	97	..	160	671	1,531	2,057	67	98	2,222	25	8	6	39	96·8	75·7	2,241
		1	1	12	12	20,128	19,325		3,841	805,754		9,830	9,090	21	15,299	2,098	27	1,475	11,759	7,161	17,387	933	804	19,124	892	261	134	1,217	94·9	81·4	1,677

		1	1	2,733	2,521	Khedá Collectorate.	165	98,485	Mahmudábád	1,392	1,141	2	2,170	177	..	184	1,819	714	2,320	77	141	2,538	115	48	37	200	96					
		1	1	2,398	2,736		216	78,673	Mátar	1,199	992	..	1,875	216	..	124	1,212	979	1,908	162	124	2,194	116	49	42	207	92					
		1	2	2,951	3695		223	136,316	Nariád	1,634	1,275	..	2,267	369	..	273	1,285	1,624	2,762	81	66	2,909	27	3	2	42	97·1					
1	1	1		982			..	24,551	Nariád Town	462	343	..	687	108	2	8	430	375	752	1	52	805	89	44	44	177	99·8					
		1	1	1,874	1,849		279	86,742	Kapatbanj	1,008	800	..	1,611	102	..	93	1,147	661	1,727	27	54	1,808	45	14	9	66	98·4					
		1	1	2,062	1,449		246	85,601	Thásrá	1,119	941	..	1,654	198	..	208	1,259	801	2,050	8	2	2,060	2	..	..	2	99·6					
		2	2	2,691	2,996		237	157,692	A'nand	1,335	1,185	..	2,140	188	..	192	1,441	1,079	2,303	85	138	2,526	108	23	40	171	96·4					
		1	1	4,119	3,123		192	144,528	Borsad	2,105	1,864	..	3,511	136	..	322	2,024	1,945	3,781	126	83	3,990	67	70	27	164	96·7					
1	1	9	9	19,810	18,374		1,558	812,538		10,254	8,541	2	15,891	1,494	2	1,406	10,617	8,178	17,603	567	660	18,830	577	251	201	1,029	96·8	6				
		1	1	1,439	2,139	Broach Collectorate.	293	73,359	Broach	719	701	2	731	531	..	153	987	433	1,269	28	125	1,422	11	4	4	19	97·8	75·3				
		1	1	960	773		..	36,932	Broach City	490	466	2	532	290	127	5	570	386	763	31	163	957	4	..	..	4	96·0	100·0	960			
	1	1	1	2,694	2,767		375	78,365	Jambusar	1,457	1,236	..	2,016	393	..	278	1,641	1,046	2,487	75	125	2,687	4	..	3	7	97·0	100·0	2,694			
		1	1	537	1,566		224	40,260	A'mod	221	223	..	300	53	..	91	273	171	389	24	31	444	39	36	18	93	94·1	52·0	1276			
		1	1	739	158		374	38,779	Wágrá	371	329	..	511	92	..	97	399	301	623	47	38	709	27	8	4	39	93·8	77·1				
		1	1	1,542	1,892		406	54,177	Ankleshwar	751	733	..	1,171	263	..	59	974	510	1,362	70	62	1,494	33	7	18	58	95·1	82·5	1,542			
1	1	5	5	7,911	9,295		1,677	321,872		4,009	3,632	4	5,264	1,622	127	674	4,944	2,847	6,893	269	544	7,706	118	55	47	220	96·2	68·2	1,582			
		1	1	2,453	1,355	Súrat Collectorate.	..	90,000	Súrat City	1,071	956	19	1,451	443	78	36	914	1,113	1,719	84	194	2,027	263	67	96	426	95·4	79·6	2,453			
		1	1	2,094	1,096		94	28,144	Chorásí	1,040	999	..	1,612	213	19	195	1,244	795	1,769	150	122	2,041	43	9	3	55	92·1	82·6	2,094			
		1	1	1,209	1,376		336	70,531	Ulpád	579	610	..	970	91	10	118	585	604	1,147	20	23	1,190	15	1	4	20	98·2	93·7	1,209			
		1	1	1,573	1,514		175	64,233	Jalálpur	818	744	..	1,316	133	..	113	832	680	1,326	69	168	1,563	9	1	6	16	95·0	90·0	1,573			
1	1	1	1	1,478	1,199		225	71,972	Balsád	747	721	..	1,376	20	5	67	562	906	1,282	39	155	1,476	8	1	1	10	97·0	88·8	1,478			
		1	1	1,571	852		188	35,411	Mándví	823	708	..	1,434	91	4	2	650	881	1,456	9	67	1,532	28	8	5	41	99·3	63·6	1,571			
		1	1	1,718	1,538		167	49,103	Chiklí	902	786	..	1,528	139	5	16	1,306	382	1,642	28	18	1,688	24	6	..	30	98·3	80·0	1,718			
		1	1	2,152	2,573		221	61,311	Bárdolí	1,035	998	..	1,907	20	..	106	831	1,212	1,951	60	32	2,043	90	24	5	119	97·0	78·8	2,152			
		1	1	1,423	1,588		103	41,604	Párdí	681	741	..	1,314	37	4	67	739	683	1,290	66	95	1,451	..	..	1	1	95·1	..	1,423			
1	1	9	9	15,676	13,091		1,509	512,309		7,696	7,263	19	12,908	1,187	125	720	7,703	7,256	13,612	525	874	15,011	480	117	121	718	96·2	80·4	1,741			
		1	1	2,959	3,206	Pálanpur Superintendency.	1,188	136,303	Pálanpur	1,528	1,428	1	2,294	369	..	292	1,245	1,711	2,891	17	48	2,956	3	..	..	3	99·4	100·0	2,959			
		..	..	896	..		864	49,821	Disá	470	421	..	854	13	..	24	458	433	799	59	39	897	4	..	1	5	93·1	100·0	896			
		1	1	1,127	695		1,012	29,858	Dhánerá	565	562	..	1,008	23	..	96	832	295	1,060	16	51	1,127	..	..	..	..	98·5	..	1,127			
				1,094	..		1,080	37,771	Kákhrej	587	494	..	902	104	..	75	727	354	1,003	10	72	1,085	5	8	..	13	99·0	38·4				
		1	1	412	997		495	19,701	Deodar	219	193	..	392	4	..	16	291	121	355	30	38	423	..	..	..	..	92·2	..	1708			
				202	..		162	7,338	Teharwádá	117	85	..	171	16	..	15	114	88	178	2	22	202	..	..	..	..	98·8	..				
		1	1	585	827		382	23,081	Wáw	322	263	..	475	49	..	61	290	295	554	6	25	585	..	..	..	..	98·9	..				
..	..			1,343	753		1,989	44,510	Tharád	674	669	..	1,153	32	..	158	847	496	1,307	10	26	1,343	..	..	..	..	99·2	..	1928			
				567	51		472	13,574	Sántalpur	323	244	..	461	32	..	74	269	298	541	7	19	567	..	..	..	..	98·7	..				
				259	31		78	6,995	Morewádá	146	113	..	232	3	..	24	155	104	235	13	11	259	..	..	..	..	94·7	..				
				50	739		362	20,096	Wárye	28	22	..	44	1	..	5	36	14	49	..	1	50	..	..	..	..	100·0	..				
		1	1	157	..		157	3,983	Charchat	81	76	..	141	5	..	11	83	74	152	2	3	157	..	..	..	..	98·7	..	1752			
		..	..	..	..		..	636	Jajhám	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..				
				214	124		162	5,659	Bhábhar	120	92	..	192	4	..	16	130	82	191	4	17	212	2	..	..	2	97·9	100·0				
				505	..		322	10,104	Sníjám	257	248	..	400	11	..	94	298	207	445	10	50	505	..	..	..	..	97·8	..				
		1	1	2,373	1,569		1,225	113,422	Rádhanpur	1,247	1,126	..	1,986	206	..	181	741	1,632	1,889	278	206	2,373	..	..	..	..	87·1	..	2,373			
..	..	6	6	12,743	8,992		10,450	522,352		6,684	6,036	1	10,705	872	..	1,142	6,516	6,204	11,649	464	628	12,741	14	8	1	23	96·1	63·6	2,123			
		1	1	722	1,203	Mahí Kánthá Agency.		42,300	WátrakKántha	330	346	..	613	29	..	34	376	300	515	159	22	696	31	8	7	46	76·4	79·4	1158			
		1	1	436	3			30,114	Rhevar	183	225	..	399	2	..	7	138	270	293	90	27	410	19	8	1	28	76·5	70·3				
		1	1	825	..			38,478	Bávesí	445	380	..	711	47	..	67	351	474	743	46	41	830	..	..	..	..	94·1	..	1566			
..	..	1	1	741	427		4,000	22,876	Katosan	401	340	..	667	24	..	50	469	272	625	127	48	800	..	..	..	..	83·1	..				
		1		1,978	2905			271698	Údar	1,066	906	..	1,810	59	..	103	956	1,016	1,787	87	102	1,976	5	1	..	6	95·3	83·3	1,978			
		1	1	1,230					A'mnagar	636	593	..	1,113	54	..	62	445	784	1,065	125	44	1,234	1	..	..	1	89·4	100·0	1,230			
		1	1	982	1,524			41,590	Sábar Kántha	514	468	..	941	21	..	20	406	576	924	47	11	982	..	..	..	..	95·1	..	982			
..	..	5	5	6,914	6,062		4,000	447,056		3,575	3,278	..	6,254	236	..	343	3,141	3,692	5,952	681	295	6,928	56	17	8	81	89·7	76·7	1,382			

1	2	3		4		5		6		7	8	9																		10				11		12
												Primary Vaccinations.																		Re-vaccinations				Percentage of successful Cases, excludingthose "Unknown" from the Total.		Average Number of Persons vaccinated by each Vaccinator.
												A.		B.					C.		D.			E.												
												Sex.		Caste.					Age.		Results.															
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.		Number of Vaccinators.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Square Miles.	Population of Area included in last column.	Name of portion of District or of Town.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccination.	In Re-vaccination.	
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.																												
Northern contd.	M.B. Cola', M.D.	..	..	1	1	1,855	1,659	Cambay..	350	117,203	Cambay.....	944	867	..	1,551	169	3	88	1,195	616	1,797	..	14	1,811	42	1	1	44	100·0	97·6	1,855
		..	..	1	1	2,189	1,307	Dharmpur	2650	25,000	Dharmpur ..	1,055	1,128	..	2,067	..	3	113	591	1,592	1,898	141	165	2,204	6	..	..	6	93·9	100·0	2,189
		..	..	1	1	1,457	762	Bánsdá ..		22,000	Bánsdá	745	712	..	1,448	9	..	..	96	1,361	1,370	16	71	1,457	..	..	..	..	98·8	..	1,457
		..	..	3	3	5,501	3,728		3,000	164,203		2,744	2,707	..	5,066	178	6	201	1,882	3,569	5,065	157	250	5,472	48	1	1	50	96·9	97·9	1,823
Grand Total of the Northern Circle.		4	4	50	50	88,997	80,013		26,035	3,595,919		44,955	40,714	56	71,576	7,769	293	5,975	46,666	39,003	78,417	3,616	4,081	86,114	2184	655	513	3,352	95·5	76·9	1,779
Circle.	Assistant Surgeon.	1	1	1	1	1,148	2,111	Karáchí Collectorate.	16,109	87,199	Karáchí	599	510	9	35	1,048	2	15	310	799	1,031	69	58	1,158	11	27	1	39	94·4	28·9	1,148
				2	2	3,983	2,729			80,000	Karáchí Town.	2,415	1,193	85	1,015	2,253	91	164	2,266	1,342	3,227	233	166	3,626	169	229	22	420	93·3	42·5	1,991
				1	1	1,174	1,972			45,489	Dádú	630	544	..	160	993	..	21	951	223	1,172	..	2	1,174	..	..	..	..	100·0	..	1,174
				1	1	1,042	1,012			39,738	Sihwán	575	467	..	132	900	..	10	237	805	1,606	10	29	1,045	..	..	..	..	99·0	..	1,042
				1	2	325	304			14,780	Mánjhándá ..	410	399	..	114	673	..	22	287	522	775	7	27	809	..	16	..	16	99·1	..	1586
						761	1,695			24,771	Kotrí and Kohistán.....	408	340	..	137	589	..	22	390	358	705	16	31	752	9	2	2	13	97·8	81·8	
		1	1	1	1	1,279	1,487			26,493	Táttá	703	550	..	89	1,118	..	46	451	802	1,227	14	22	1,263	24	..	2	26	98·9	100·0	1,279
				1	1	323	1,620			14,270	Mírpur Sákrá .	174	149	..	12	299	..	12	111	212	310	6	10	326	..	..	..	..	98·1	..	1229
				1	1	906	529			15,930	Ghodábárí....	467	438	..	65	830	..	10	177	728	857	9	44	910	..	1	..	1	98·9	..	
				1	1	683	884			17,656	Sháhábandar .	330	224	..	66	458	..	30	87	467	550	4	..	554	108	13	8	129	99·3	89·2	653
				1	1	803	1,758			15,981	Játí	396	351	..	37	513	..	197	262	485	731	11	9	751	26	14	17	57	98·5	65·0	1672
				1	1	869	1,210			19,000	Belá.....	444	403	..	57	688	..	102	330	517	838	5	6	849	12	3	7	22	98·4	80·0	
				1	1	1,092	1,449			25,693	Mírpur Batorá	561	508	..	91	859	..	119	359	710	1,025	10	37	1,072	6	8	9	23	99·0	42·8	1,092
		1	1	11	12	14,888	18,760		16,109	427,000		8,112	6,076	94	2,010	11,221	93	770	6,218	7,970	13,462	386	441	14,289	365	313	68	746	97·2	53·8	1,353
Circle.	Assistant Surgeon.	1	1	1	1	1,124	484	Collectorate.	16,483	56,200	Shikárpur....	609	515	..	129	975	..	20	684	440	1,122	..	2	1,124	..	..	..	..	100·0	..	
				1	1	1,452	1,863			36,000	Do. Town.	787	496	2	660	607	..	14	814	469	1,203	82	25	1,310	133	32	4	169	93·6	80	
				1	1	1,537	500			68,249	Rohrí	861	670	..	322	1,084	..	125	693	888	1,449	40	69	1,558	2	3	1	6	97·3		
						..	785				Saidpur.....	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	
				1	1	1,050	1,551			33,780	Ghotkí	560	490	..	161	810	..	79	741	309	1,017	8	31	1,056	..	..	..	..	99·2		
				1	1	1,787	2,445			21,214	Mírpur Mátelo	1,106	681	..	123	1,474	..	190	328	1,459	1,786	25	1	1,812	..	..	..	..	98·6		
				1	1	1,456	1,111			20,709	Obáurá	832	602	..	102	1,091	..	241	756	678	1,389	8	45	1,442	21	..	1	22	99·4		
				1	1	1,730	1,439			46,646	Sakkhar.....	937	793	..	487	1,182	..	61	1,447	283	1,700	52	16	1,768	..	..	..	..	97·0		
				1	1	1,196	729			31,000	Sakkhar Town	625	389	12	394	579	..	29	491	523	728	31	276	1,035	130	26	26	182	95·9		
		1	1	1	1	1,880	262			47,903	Nánsháhrá Abrú	1,048	832	..	352	1,455	..	73	1,367	513	1,833	5	47	1,885	..	..	..	..	99·		
				1	1	130	554			20,000	Sajáwal	72	58	..	15	111	..	4	66	64	130	..	..	130	..	..	..	..	100		
				1	1	253	1,836			35,733	Ratáderá	159	103	..	37	191	..	25	158	95	248	..	5	253	..	..	..	..	10		

			1	1	645	598	Shikárpur			98,770	Ládkháná....	347	296	..	43	591	..	9	278	365	626	12	15	653	2	..	..	2	98·1	..			
			1	1	1,695	2,445				44,223	Kambar	914	776	..	209	1,455	..	26	927	763	1,689	7	1	1,697	3	..	2	5	99·6	..			
			1	1	9	976				23,879	Nasirábád....	4	5	..	..	9	..	..	1	8	9	..	..	9		..	..	..	100·0	..			
					1,638	982				14,000	Labdaryá	876	762	..	225	1,356	..	57	851	787	1,579	48	52	1,679	..	..	..	..	97·0	..			
			1	1	1,349	1,667				15,000	Tiger or Thurí.	728	621	..	120	1,205	..	24	344	1,005	1,318	..	31	1,349	..	..	..	..	100·0	..			
					528	..				46,462	Mehar	267	261	..	43	480	..	5	196	332	498	..	30	528	..	..	..	..	100·0	..			
			1	1	1,624	1,558				24,255	Kakkar	909	709	..	212	1,398	..	8	984	634	1,490	43	113	1,646	..	1	5	6	97·2	..			
	1	1	15	15	21,083	21,785		16,483	6,84,023			11,632	9,059	14	3,634	16,053	..	990	11,126	9,565	19,814	361	759	20,934	291	62	39	392	98·2	81·8			
			1	1	2,620	2,280	Haidarábád Collectorate.	1,826	61,009	Haidarábád ..	1,398	1,166	..	367	2,053	..	144	771	1,793	2,473	65	53	2,591	29	16	11	56	97·3	64·4			
			1	1	1,597	1,826		14	35,272	Haidarábád Town	1,042	502	27	631	879	..	7	895	649	1,513	22	11	1,546	42	11	..	53	98·6	79·2	1,597		
			1	1	1,518	931		989	56,559	Tándá.....	735	667	..	106	1,226	..	70	542	860	1,297	29	94	1,420	44	37	35	116	97·8	54·3	1,518		
			1	1	2,001	1,011		694	47,922	Bárá-ká-Tándá.....	1,060	889	..	190	1,479	..	280	711	1,238	1,754	228	175	2,157	38	7	14	59	89·0	84·4	2,001		
			1	1	1,891	1,556		794	51,593	Baddin	1,063	819	..	145	1,638	..	99	382	1,500	1,795	6	81	1,882	8	..	1	9	99·7	100·0	1,891		
			1	1	1,892	1,124		676	30,445	Digrí	1,012	844	..	220	1,462	..	174	1,078	778	1,825	16	30	1,871	31	1	4	36	99·1	96·9	1,892		
	1	1	1	1	1,087	2,457		861	55,833	Alhar-ká-Tándá.....	583	487	..	200	771	..	99	540	530	843	74	187	1,104	7	5	5	17	91·3	41·7	1087		
			..	..	..	469		497	22,449	Mírpur Khás ..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..			
			1	1	2,156	2,367		645	55,707	Shahdádpur..	1,088	864	..	328	1,468	..	156	887	1,065	1,942	48	6	1,996	184	18	2	204	97·6	91·1	2,156		
			1	1	1,959	2,605		444	74,141	Hálá	1,056	800	..	297	1,513	..	46	648	1,208	1,736	49	73	1,858	47	15	41	103	97·1	75·8	1,959		
			1	1	2,237	2,149		976	53,566	Sakkrand	1,153	986	..	250	1,829	..	60	1,073	1,006	2,034	13	99	2,146	55	14	29	98	99·4	79·7	2,237		
			1	1	1,797	1,867		457	45,551	Morá	922	814	..	213	1,435	..	88	558	1,178	1,546	93	117	1,756	44	3	14	61	94·3	93·6	1,797		
			1	1	1,535	1,880		485	70,492	Nausháhrá-Ferozá	823	686	..	195	1,202	..	112	839	670	1,423	20	80	1,523	19	2	5	26	98·6	90·5	1,535		
			1	1	1,838	2,275		277	47,768	Khandiárá ..	975	846	..	186	1,581	..	54	1,068	753	1,753	24	66	1,843	11	..	6	17	98·6	100·0	1,838		
	1	1	13	13	24,128	24,818		9,635	708,307		12,910	10,370	27	3,328	18,536	..	1,389	9,992	13,288	21,934	687	1,072	23,693	559	129	167	855	96·9	81·2	1,856		
	..	..	1	1	1,824	2,291	Frontier Upper Sindh.	2,009	35,000	Jacobábád....	1,046	727	1	89	1,657	..	26	831	942	1,672	18	92	1,782	22	22	7	51	98·9	50·0	1,824		
			1	1	735	..			15,000	Kasmar.....	408	319	..	37	677	..	13	289	438	723	3	1	727	8	..	..	8	99·6	100·0	735		
			1		661	210			25,000	Thúl	356	303	..	74	577	..	8	447	212	640	18	18	676	2	..	..	2	97·3	100·0	661		
	..	..	3	1	3,220	2,501		2,009	75,000		1,810	1,349	1	200	2,911	..	47	1,567	1,592	3,035	39	111	3,185	32	22	7	61	98·7	59·3	1,610		
			1	1	2.251	2,166	Tharand Párkar.		36,527	Umarkot	1,240	1,011	..	223	1,330	..	698	609	1,642	2,179	56	16	2,251	..	..	..	..	97·5	..	2,251		
			1	1	2,587	1,055			27,847	Cháchrá	1,352	1,035	..	577	1,014	..	796	505	1,882	2,370	30	2	2,402	107	93	..	200	98·7	53·0	2,587		
			1	1	921	564			28,259	Nagar Párkar.	488	388	..	203	312	..	361	349	527	842	10	27	879	38	3	4	45	98·8	92·5	921		
	1	1	1	1	888	1,231		12,729	14,524	Diplá	479	374	..	81	608	..	164	132	721	828	5	25	858	17	17	1	35	99·4	50·0	888		
			1	1	1,468	..			27,189	Kiprá.....	790	650	..	28	1,065	..	317	497	913	1,386	1	14	1,410	41	17	..	58	99·3	70·0	2377		
			1	1	909	1,101			17,956	Sánghar	511	377	..	15	721	..	152	227	661	865	20	3	888	20	1	..	21	97·7	95·2			
			1	1	1,575	1,010			23,039	Mitti	874	686	..	129	829	..	602	199	1,361	1,509	33	18	1,560	14	1	..	15	97·9	93·3	1,575		
	1	1	6	6	10,599	7,127		12,729	175,341		5,704	4,521	..	1,256	5,879	..	3,090	2,518	7,707	9,979	164	105	10,248	237	132	5	374	98·4	64·2	1,766		
	..	..	1	1	1,941	2,180	Native State.	..	110,000	Khairpur	1,262	679	..	291	1,487	..	163	677	1,264	1,486	392	447	2,325	..	..	..	..	79·1	..	1,941		
Grand Total of the Sindh Circle.	4	4	49	48	75,859	77,171		56,965	2,179,671		41,430	32,054	136	10,719	56,087	93	6,449	32,098	41,386	69,710	2,029	2,935	74,674	1484	658	286	2,428	97·2	69·3	1,530		

1	2	3	4	5		6		7	8	9																10				11		12
										PRIMARY VACCINATIONS.															R-VACCINATIONS.				Percentage of successful Cases, excluding those "Unknown" from the Total.		Average Number of Persons vaccinated by each Vaccinator.
										A.		B.					C.		D.			E.										
										SEX.		CASTE.					AGE.		RESULTS.													
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.	Number of Vaccinators.	Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Square Miles.	Population of Area included in last column.	Name of portion of District or of Town.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccination.	In Re-vaccination.	
		1872-73. 1871-72.	1872-73. 1871-72.	1872-73.	1871-72.																										
									Northern Division.																						
			.. a	..	..	Chúrá....	62	20,000	Chúrá.....	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			1 1 2 / 1 1 2	2619	2,094 / 1,030	Dhrángdrá.	1,050	100000	Dhrángdrá / Halwad	1,387	1,220	..	2,427	103	..	77	980	1,627	2,386	157	91	2,634	11	1	..	12	93·8	91·6	2,619
			.. 6 / 1 2																												
			1 1 2 / 1 1 2	2,381	1,829	Jinjíwádá.	225	22,309	Jinjíwádá	1,283	1,098	..	2,024	185	..	172	862	1,519	2,357	12	15	2,384	..	..	..	..	99·4	..	2,381
			1 1 2 / 1 1 2	3,012	2,094	Native States.	208	40,000	Jasdan	1,546	1,457	..	2,731	216	..	56	1,096	1,907	2,870	41	92	3,003	6	3	..	9	98·5	66·6	3,012
			1 1 2 / 1 1 2	2,108	2,327		238	75,000	Limdí.....	1,103	1,005	..	1,939	102	..	67	793	1,315	2,047	39	22	2,108	..	..	..	..	98·1	..	2,108
			.. 5 / 1 2	..	627		164	35,000	Lakhtar.....	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			.. 1 / 1 2	..	22		99	15,000	Máliá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			.. 4 / 1 2	..	453		130	20,000	Múlí	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			.. b	..	..		36	2,000	Pátrí	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			1 1 1 / 1 2	2,332	1,886		184	33,000	Sáelá	1,145	1,090	..	1,941	66	..	228	592	1,643	2,165	6	65	2,236	83	4	10	97	99·7	95·4	2,332
			.. c	..	..		48	3,000	Sudámdá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			.. d	..	..		19	7,500	Vitthalgarh ..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			1 1 1 / 1 2	1,527	1,878		382	50,000	Wákáner	732	676	..	1,089	277	..	42	682	726	1,248	71	89	1,408	60	54	5	119	94·6	52·6	1,527
			1 1 0 / 1 2	2,659	1,534		171	60.000	Wadwán	1,438	1,196	..	2,449	156	..	29	667	1,967	2,481	128	71	2,680	13	10	2	25	95·0	56·5	2,659
			.. e	..	..		36	5,000	Wanod	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		1 1	7 8	16,638	15,774		3,052	487,309		8,634	7,742	..	14,600	1,105	..	671	5,672	10,704	15,554	454	445	16,453	173	72	17	262	97·1	70·6	2,376
									Western Division.																						
			1 9 / 1 2	2,287	1,450	Dharol ..	277	25,000	Dharol	1,149	1,130	..	1,962	257	..	60	530	1,749	2,135	121	60	2,316	6	1	1	8	94·6	85·7	
			1 5 / 1 2	1,296	604	Dráphá ..	80	9,500	Dráphá	742	548	..	1,141	129	..	20	380	910	1,137	133	20	1,290	3	2	1	6	89·5	60	
			.. 5 / 1 2	..	576	Gondal..	1,050	100000	Dhorájí	1,145	1,035	1	1,722	393	3	61	1,442	738	1,958	131	125	2,214	26	39	3	68	93·7	4	
		1 1	1 1 2 / 1 1 2	2,248	2,033				Gondal																						
			.. 5 / 1 2	..	700				Upletá																						

Northern Division.—*a* Under the Limdí Vaccinator. *b* Under the Jinjíwádá Vaccinator. *c* Under the Sáelá Vaccinator.
d Under the Lakhtar Vaccinator. *e* Under the Jinjíwádá Vaccinator.

..	*a*	..	..	Native States.	11	1,500	Gadká	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
..	*b*	..	..		53	3,500	Gawarídhar ..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
..	*a'*	..	..		40	3,000	Taliá Diwání .	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
..	4/12	..	554		27	6,500	KotráSangání.	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
..	13/12	2,993	2,838	Morví..	598	75,000	Morví.....	1,542	1,451	..	2,687	306	..	..	1,703	1,290	2,926	15	52	2,993	..	..	..	..	99·4	..											
1	4/12	257	472				Tankárá.....	121	133	..	184	70	..	..	85	169	236	22	1	259	3	..	..	3	91·4	100·0											
1	8/12	1,618	805	Nawánagar.			Bhánwad	838	766	..	1,311	259	..	34	549	1,055	1,494	85	50	1,629	14	..	..	14	94·6	100·0											
..	*c*	..	..				Jodhpur	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
..	5/12	..	449		3,460	200,000	Júdiá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	11/12	2,228	1,647				Khambáliá ..	1,222	1,006	..	2,002	220	..	6	1,092	1,136	2,143	3	82	2,228	..	..	..	..	99·8	..	2,228										
..	*d*	..	..				Kondurná....	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	12/12	2,800	2,220				Nawánagar ..	1,542	1,251	..	2,031	711	1	50	749	2,044	2,436	164	193	2,793	4	3	..	7	93·6	57·1	2,800										
..	*a''*	..	..	Pál.	12	1,500	Pál	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
2	24/12	4,433	4,158	Rájkot.	400	30,000	Rájkot	2,108	2,099	2	3,496	488	6	215	2,463	1,744	3,629	375	320	4,324	141	79	6	226	90·6	64·0	4,433										
..	*e*	..	..	Wasáwar.	21	3,360	Wasáwar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	9/12	2,797	2,677	Porbandar	661	75,000	Porbandar ..	1,394	1,403	..	2,456	229	..	112	1,272	1,525	2,703	82	12	2,797	..	..	..	..	97·0	..	2,797										
1	1	10	10 5/12	22,957	21,183	.	6,690	533,860		11,803	10,822	3	18,992	3,062	10	558	10,265	12,360	20,781	1,131	915	22,843	197	124	11	332	94·8	61·3	2,295										
							Southern Division.																															
1	12/12	1,537	1,991	Bábriá-wád.	25	4,000	Bábriáwád ..	764	770	..	1,402	132	..	..	641	890	1,337	68	129	1,534	3	..	..	3	95·1	100·0	2613										
	12/12	1,076					Jáfrábád	549	522	..	962	100	..	9	322	749	979	33	59	1,071	3	2	..	5	96·7	60·0											
1	12/12	2,502	2,260	Bántwá.	70	30,375	Bántwá	1,304	1,201	..	1,954	521	..	30	553	1,952	2,475	29	4	2,508	..	..	..	..	98·8	..	2,502										
1	7/12	790	1,100	Bagúsrá.	70	11,628	Bagúsrá.....	399	344	..	647	96	..	..	448	295	656	59	28	743	47	..	..	47	91·7	100·0	790										
							Mánikwádá ..																															
..	*a*	..	..	Bilká.	55	10,880	Bilká	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	12/12	3,300	2,555	Jaitpur.	233	37,950	Jaitpur	1,761	1,529	..	2,738	394	..	158	1,394	1,896	3,205	54	35	3,294	10	..	..	10	98·3	100·0	3,300										
..	3/12	..	247				Chorwád	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	12/12	2,277	2,184				Junágarh	1,210	1,067	..	1,795	451	..	31	803	1,474	2,172	28	77	2,277	..	..	..	..	98·7	..	2,277										
..	5/12	..	734				Kutiáná.....	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	12/12	2,126	1,747	Junágarh.	3,240	311,550	Mangarul	1,180	911	..	1,372	686	..	33	786	1,305	1,569	459	63	2,091	34	1	..	35	77·3	97·1	2,126										
1	12/12	2,144	2,269				U'ná	1,120	1,014	..	1,912	174	..	48	567	1,567	2,131	28	3	2,162	9	1	..	10	98·7	90·0	2,144										
..	*b*	..	..				Pattan	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1	6/12	1,202	701				Viráwal	646	555	..	597	182	..	62	140	1,061	1,090	55	59	1,204	1	.	..	1	95·1	100·0	1,202										
..	4/12	..	450				Visáwadar ..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
8	8 1/12	16,957	16,238					8,933	7,913	..	13,739	2,736	..	371	5,657	11,189	15,614	813	457	16,884	107	4	..	111	95·0	96·3	2,119										

Western Division.—*a a' a''* Under the Native State's Vaccinator. *b* Under the Rájkot Government Vaccinator. *c* Under the Bhánwad Vaccinator. *d* Under the Porbandar Vaccinator.
e Under the Gondal Vaccinator.
Southern Division.—*a* Under the Junágarh Vaccinator. *b* Under the Viráwal Vaccinator

1	2	3		4		5		6	7	8	9																		10				11		12
											Primary Vaccinations.																		Re-vaccinations.				Percentage of successful Cases, excluding those "Unknown" from the *Total*.		Average number of Persons vaccinated by each Vaccinator.
											A.		B.					C.		D.				E.										
											Sex.		Caste.					Age.		Results.														
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.		Number of Vaccinators.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Population of Area included in last column.	Name of portion of District or of Town.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccination.	In Re-vaccination.	
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.		Square Miles.																								
KA'THIA'WA'D CIRCLE—*continued.*										*Eastern Division.*																							
	E. R. BUTLER, M.D., Surgeon—*continued.*	1	1	1 1/2	1 1/2	2,005	1,716	Bhávanagar.	2,032	2,50,000 Bháwanagar	1,070	935	..	1,765	237	3	..	574	1,431	1,965	15	25	2,005	..	..	..	..	99·2	..	2,005
				1	1 1/2	2,551	1,654			Botád	1,381	1,170	..	2,313	192	..	46	731	1,820	2,497	3	51	2,551	..	..	..	..	99·8	..	2,551
				1	1 1/2	2,523	2,005			Kundalá	1,291	1,158	..	2,184	208	..	57	513	1,936	2,091	130	239	2,460	36	17	21	74	94·1	67·9	2,523
				..	5	..	614			Liliá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				1	1 4	2,610	2,476			Mowá	1,355	1,244	..	2,427	167	1	4	588	2,011	2,501	46	56	2,603	2	1	8	11	98·1	66·6	2,610
				..	5	..	732			Noganwadar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				..	2	..	204			Umrálá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				1	1 1	2,130	1,301			Shehor	1,066	1,064	..	2,004	126	..	..	592	1,538	2,061	..	69	2,130	..	..	..	..	100·0	..	2,130
				1	1 2	2,399	1,922			Talájá	1,239	1,160	..	2,219	159	..	21	711	1,688	1,732	207	460	2,399	..	..	..	..	89·3	..	2,399
				..	5	..	353			Low Caste Vaccinator.	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				..	a	..	..	Láthí	48	10,000 Láthí	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				..	4	..	446	Und Surveyá.	..	14,080 Dánthá / Und Surveyá.	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				1	1 1	2,443	1,251	Palitáná	300	60,000 Pálitáná	1,279	1,136	..	2,225	128	..	62	456	1,959	2,269	18	130	2,417	26	..	2	28	99·2	100·0	2,443
				1	1 0	2,355	1,577	Wallá	140	20,000 Wallá	1,217	1,138	..	2,090	113	..	152	570	1,785	2,290	33	32	2,355	..	..	..	..	98·5	..	2,355
		1	1	8	9 1/2	19,016	16,251		2,520	354,060	9,898	9,005	..	17,227	1,330	4	342	4,735	14,168	17,406	452	1,062	18,920	64	18	31	113	97·4	78.0	2,377
Grand Total of the Káthiáwád Circle.		2	2	33	33	75,568	69,446		15,965	1,782,062	39,268	35,482	3	64,558	8,233	14	1,942	26,329	48,421	69,371	2,850	2,879	75,100	541	218	59	818	96·0	71·6	2,289
KANTHA'CIRCLE																																	
	Assist. Surgeon.			1	1	1,505	1,673	Panch Máhals.	62	74,014 Godhrá	776	674	..	1,407	26	..	17	428	1,022	1,448	2	..	1,450	36	15	4	55	99·8		
				1	1	1,706	2,500		32	63,513 Dohad	821	789	..	1,478	104	..	28	623	987	1,591	48	2	1,641	70	18	8	96	97·0		
				1	1	1,474	1,698		14	40,502 Kalol	740	714	..	1,354	47	..	53	947	507	1,436	17	16	1,469	19	..	1	20	98·8		
				1	1	1,492	1,420		200	36,785 Jhálod	734	753	..	1,467	18	..	2	209	1,278	1,360	55	115	1,530	1	3	1	5	96·1		
				1	1	773	1,291		375	25,926 Halol	378	377	..	589	17	1	148	467	288	754	1	..	755	18	..	..	18	99·8		
		5	5			6,950	8,582		1,669	240,740	3,449	3,307	..	6,295	212	1	248	2,674	4,082	589	12	133	6,845	144	36	14	194	95		

Eastern Division.—*a* Under the Shehor Vaccinator.

Rewá' S. B. Haliday,	1	1	2	2	1,726	2,467	Rewá Kánta States.	1,736	74,813	Lúnwádá	868	835	..	1,384	253	..	66	504	1,199	1,628	48	36	1,712	16	6	1	23									
			2	2	3,306	2,363		4,500	102,036	Rájpíplá	1,635	1,626	..	3,040	88	11	122	1,072	2,189	3,173	183	18	3,374	30	10	5	45	9								
			2	2	3,692	2,770		1,600	52,421	Bária	1,885	1,807	..	3,221	1	8	462	648	3,044	3,535	69	98	3,702	..	..	..	..	9								
			1	1	728	1,214		400	41,984	Bálásinúr	358	360	..	566	112	..	40	190	528	625	41	65	731	4	4	3	11	93								
			1	1	510	553		3,000	62,913	Chotá Udaipur	207	301	..	462	9	..	37	49	459	448	65	11	524	1	..	1	2	87·3								
			1	1	944	702		900	62,364	Smith and Kadáná	462	482	..	840	9	..	95	104	840	914	16	20	950	..	..	..	..	98·2								
			1	1	932	830		400	46,966	Sankhedá Mewás	473	453	..	893	22	..	11	245	681	866	8	60	934	3	..	4	7	99·0								
	1	1	10	10	11,838	10,899		12,536	443,497		5,888	5,864	..	10,406	494	19	833	2,812	8,940	11,189	430	303	11,927	54	20	14	88	96·2								
Grand Total of the Rewá Kántá Circle.	1	1	15	15	18,788	19,481		14,205	684,237		9,337	9,171	..	16,701	706	20	1,081	5,486	13,022	17,778	553	441	18,772	198	56	28	282	96·9	77·9	1,252							
Presidency Circle. Ananta' Chandroba', Sub-Assistant Surgeon.			1	1	310	224	City of Bombay.	19	16,601	Kolábá	157	101	37	173	13	9	26	154	104	217	28	24	269	30	22	..	52	88·57	57·6	1958						
			1	1	711	702			32,095	Fort	265	218	37	114	27	294	11	254	229	422	49	36	507	88	99	41	228	89·5	47·0							
			1	1	937	2,009			10,464	Esplanade....	236	200	10	127	23	6	270	261	175	342	99	41	482	306	165	30	501	77·5	64·9							
			1	1	930	838			43,198	Market	535	382	30	668	150	62	7	553	364	801	86	65	952	10	2	1	13	90·3	83·3							
			1	1	428	489			35,100	Mándví	227	200	6	336	61	..	24	223	204	378	27	26	431	..	..	1	1	93·3	..	1828							
					470	406			36,743	Chakhlá.....	282	187	1	184	230	32	22	244	225	416	21	34	471	1	..	..	1	95·1	100·0							
					1,118	763			37,915	Dhobí Taláo..	584	445	138	627	34	183	47	637	392	913	81	73	1,067	42	43	4	89	91·3	49·4							
			1	1	382	267			20,760	Phanas Wádí.	232	145	19	343	7	7	1	222	155	319	46	19	384	3	1	1	5	87.3	75·0	2187						
					687	287			36,029	Bhuleshwar ..	409	278	2	423	211	25	26	368	319	572	53	66	691	..	..	..	..	91·5	..							
					739	874			24,817	Girgáum	415	311	70	577	19	48	12	417	309	593	80	64	737	8	2	3	13	88·1	80·0							
			1	1	169	239			7,531	Chawapátí....	78	52	4	103	7	15	2	79	51	112	13	6	131	3	36	..	39	89·6	7·6	1541						
					219	383			7,741	Wálkeshwar..	121	93	23	159	6	6	20	132	82	187	16	16	219	..	2	3	5	92·1	..							
					414	149			4,317	Mahálakshumí	228	152	18	339	3	9	11	191	189	329	26	30	385	18	13	3	34	92·6	58·0							
					1,129	938			21,234	Khetwádí....	677	449	17	883	78	82	66	632	494	958	93	90	1,141	3	..	..	3	91·0	100·0							
			1	1	680	273			23,638	Khárá Taláo..	397	278	11	452	135	10	66	368	307	588	52	38	678	4	1	..	5	91·8	80·0							
					387	223			27,594	Kumbhár Wádá	213	172	9	314	37	..	26	231	155	327	34	28	389	..	..	1	1	90·5	..	2196							
			1	1	1,076	580			49,873	Umbarkhádí..	518	307	69	449	257	7	43	406	419	664	106	56	826	46	164	41	251	86·2	21·9							
					890	850			25,556	Dongarí	539	348	7	801	49	2	28	539	348	791	54	51	896	1	1	1	3	93·6	50·0	1966						
			1	1	421	506			20,973	Mázgaon	224	163	96	197	49	31	14	214	173	322	38	36	396	14	13	7	34	89·4	51·8							
			1	1	208	210			10,083	Tád Wádí....	57	45	9	83	3	1	6	58	44	80	20	6	106	33	73	..	106	80·0	31·1	629						
			1	1	1,099	1,948			46,996	Kámáthipurá.	610	474	51	668	163	3	199	620	464	931	87	79	1,097	3	7	5	15	91·4	30·0							
					694	347			28,032	Bycullá	287	128	73	244	65	10	23	173	242	324	54	40	418	77	166	36	279	85·7	31·6	1793						
			1	1	593	656			13,773	Parel	347	225	45	470	19	4	34	313	259	475	64	42	581	7	3	11	21	88·1	70·0							
					246	178			4,460	Shiwrí	134	112	4	223	12	..	7	140	106	211	26	10	247	..	..	..	..	89·7	..	839						
					314	481			11,572	Sion	186	128	47	116	2	..	4	142	172	287	24	20	331	..	..	..	..	92·2	..							
			1	1	599	263			14,310	Máhim	382	217	111	443	40	1	4	321	278	524	40	38	602	..	..	..	..	92·9	..	1099						
					186	42			10.042	Warlí	111	75	26	147	11	..	2	74	112	169	12	10	191	..	..	..	..	93·3	..							
			1	1	171	294			22,953	WaterDivision	17	..	2	..	15	..	..	1	16	10	6	1	17	8	66	80	154	62·5	10·8							
					208	23			..	Out Stations.	118	60	59	27	87	1	4	48	130	81	182	35	298	7	23	..	30	30·7	23·3	379						
Grand Total of the Presidency Circle.			11	11	16,415	15,457		19	644,405		8,586	5,946	1031	9,835	1,813	848	1,005	8,015	6,517	12,343	1,517	1,080	14,940	712	902	269	1,883	89·0	44·1	1,492						
Barodá'. G. Edwin Edward, Surgeon.	1	1	23	23	29,661	23,491	Native State of Barodá.	Unknown.		Barodá Districts.	16,314	13,053	..	26,329	2,405	30	603	10,062	19,305	26,058	2,003	1,306	29,367	238	22	34	294	92·8	91·5	1,289							

1	2	3		4	5		6		7	8	9														10				11		12
											Primary Vaccinations.														Re-vaccinations.				Percentage of successful cases, excluding those "Unknown" from the Total.		
											A.		B.					C.		D.			E.	A.	B.	C.	D.			
											Sex.		Caste.					Age.		Results.											
Circle.	Name and Rank of Superintendent.	Number of Native Superintendents.		Number of Vaccinators.	Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State in which Vaccinations were performed during the year.	Square Miles.	Population of Area included in last column.	Name of portion of District or of Town.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccination.	In Re-vaccination.	Average Number of Persons vaccinated by each Vaccinator.
		1872-73.	1871-72.	1872-73.	1872-73.	1871-72.																									
Kutch.	Dora Bjí Hormasjí, G.G.M.C.	1	1	9	10	1,932	1,706	Native State of Kutch.	6,764	148,402	Bhúj, Mándvi, Mundrá, Anjár, &c.	1,027	896	..	1,318	599	6	..	383	1,540	1,783	107	33	1,923	8	1	..	9	94·3	88·8	214
Aden.	R. W. James, M.D., Surgeon Major.	..	..	2	1	684	446	Aden.	..	19,289	City of Aden.	537	147	3	25	110	137	409	225	459	490	194	..	684	..	..	..	..	71·6	..	342
Grand Total.		27	26	373	370	561,876	526,402		205,252	21,169,452		289,221	257,620	2,469	417,020	91,581	1,595	34,176	198,434	348,357	495,930	28,049	30,244	554,223	8,332	4,361	1,936	15,129	94·6	66·9	1,506

Details of Column 5.

Total number of *persons* vaccinated	561,876
Deduct *persons* re-vaccinated	15,035
Number of *persons* primarily vaccinated	546,841

Details of Primary Vaccinations.

Total number of *operations* (Col. 9 E.)	554,223
Deduct *persons* vaccinated	546,841
Number of *operations* in excess of *persons*	7,382

Details of Re-vaccinations.

Total number of *operations* (Col. 10 D.).....	
Deduct *persons* vaccinated	
Number of *operations* in excess *persons* ...	

A.—VACCINE DEPARTMENT.

CIVIL.

STATEMENT No. II., showing the Monthly Number and Results of the Vaccinations performed, in each Circle of Superintendence, in the Bombay Presidency during the year 1872-73.

1	2	3	4	5			6	7
Circle of Superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total Number vaccinated.	Results.			Total.	Average percentage Successful, excluding those "Unknown."
				Successful.	Unsuccessful, including "Doubtful."	Unknown.		
Central Circle.	April 1872.	Whole Circle	13,444	11,791	696	1,172	13,659	94·4
	May „	Do.	9,856	8,652	556	883	10,091	93·9
	June „	Do.	8,858	7,827	495	729	9,051	94·0
	July „	Do.	8,748	7,746	504	676	8,926	93·8
	August „	Do.	7,972	6,822	576	727	8,125	92·2
	September „	Do.	6,840	5,853	521	648	7,022	91·8
	October „	Do.	7,664	6,597	457	741	7,795	93·5
	November „	Do.	8,596	7,525	494	740	8,759	93·8
	December „	Do.	10,199	9,025	516	805	10,346	94·5
	January 1873.	Do.	10,567	9,507	376	787	10,670	96·1
	February „	Do.	9,916	8,822	418	791	10,031	95·4
	March „	Do.	11,477	9,918	450	1,231	11,599	95·6
		Total...	114,137	100,085	6,059	9,930	116,074	94·2
Southern Circle.	April 1872.	Whole Circle	7,604	6,498	799	500	7,797	89·0
	May „	Do.	6,193	5,361	558	409	6,328	90·0
	June „	Do.	6,153	5,461	411	403	6,275	91·2
	July „	Do.	5,049	4,289	457	396	5,142	90·3
	August „	Do.	5,945	5,233	530	346	6,109	90·8
	September „	Do.	5,026	4,301	425	398	5,124	91·0
	October „	Do.	4,480	3,693	441	447	4,581	89·3
	November „	Do.	5,277	4,474	434	448	5,356	91·1
	December „	Do.	5,419	4,662	390	457	5,509	92·2
	January 1873.	Do.	6,842	5,817	513	614	6,944	91·8
	February „	Do.	6,470	5,513	574	504	6,591	90·5
	March „	Do.	5,565	4,668	456	523	5,647	91·1
		Total...	70,023	59,970	5,988	5,445	71,403	90·9

1	2	3	4	5			6	7
Circle of Superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total Number vaccinated.	Results.			Total.	Average percentage Successful, excluding those "Unknown."
				Successful.	Unsuccessful, including "Doubtful."	Unknown.		
Western Circle.	April 1872.	Whole Circle	6,291	5,875	382	128	6,385	93·8
	May „	Do.	6,462	5,934	477	184	6,595	92·5
	June „	Do.	5,584	5,094	395	204	5,693	92·8
	July „	Do.	5,049	4,598	363	166	5,127	92·6
	August „	Do.	6,648	6,117	476	228	6,821	92·7
	September „	Do.	5,754	5,122	572	226	5,920	89·9
	October „	Do.	5,489	5,050	401	193	5,644	92·6
	November „	Do.	5,268	4,808	354	229	5,391	93·1
	December „	Do.	5,476	4,853	452	267	5,572	91·4
	January 1873.	Do.	5,375	4,760	357	357	5,474	93·0
	February „	Do.	6,329	5,725	373	308	6,406	93·8
	March „	Do.	6,087	5,456	392	359	6,207	93·2
		Total...	69,812	63,392	4,994	2,849	71,235	92·6
Northern Circle.	April 1872.	Whole Circle	9,433	8,621	347	493	9,461	96·1
	May „	Do.	7,966	7,215	342	432	7,989	95·4
	June „	Do.	7,093	6,390	426	333	7,149	93·7
	July „	Do.	6,078	5,409	418	289	6,116	92·8
	August „	Do.	5,166	4,568	430	228	5,226	91·3
	September „	Do.	4,299	3,830	304	212	4,346	92·6
	October „	Do.	5,405	4,922	301	227	5,450	94·2
	November „	Do.	6,514	6,045	220	278	6,543	96·4
	December „	Do.	7,653	7,072	299	319	7,690	95·9
	January 1873.	Do.	8,252	7,608	226	447	8,281	97·1
	February „	Do.	11,013	9,855	535	672	11,062	94·8
	March „	Do.	10,125	9,066	423	664	10,153	95·5
		Total...	88,997	80,601	4,271	4,594	89,466	94·9
Sindh Circle.	April 1872.	Whole Circle	6,396	5,974	199	292	6,465	96·3
	May „	Do.	6,433	6,070	191	259	6,520	96·9
	June „	Do.	6,325	5,898	220	320	6,438	96·4
	July „	Do.	5,520	5,151	165	285	5,601	96·9
	August „	Do.	4,936	4,626	208	212	5,046	95·7
	September „	Do.	4,296	4,003	204	203	4,410	95·1
	October „	Do.	4,876	4,523	154	272	4,949	96·7
	November „	Do.	5,060	4,766	165	199	5,130	96·7
	December „	Do.	6,679	6,263	275	244	6,982	96·7
	January 1873.	Do.	8,765	8,331	274	304	8,909	96·8
	February „	Do.	8,605	8,116	322	327	8,765	96·2
	March „	Do.	7,968	7,473	310	304	8,075	96·0
		Total...	75,859	71,194	2,687	3,221	77,102	96·3

1	2	3	4	5			6	7
Circle of Superintendence.	Months	District in which operations were chiefly conducted in each month.	Total Number vaccinated.	Results.			Total.	Average percentage Successful, excluding those "Unknown.
				Successful.	Unsuccessful, including "Doubtful."	Unknown.		
Kathiawad Circle.	April 1872.	Whole Circle	7,029	6,560	251	248	7,059	96·3
	May ,,	Do.	6,503	6,080	259	210	6,549	95·9
	June ,,	Do.	6,221	5,772	242	237	6,251	95·9
	July ,,	Do.	6,142	5,613	316	259	6,188	94·6
	August ,,	Do.	6,781	6,217	377	226	6,820	94·2
	September ,,	Do.	5,009	4,623	205	208	5,036	95·7
	October ,,	Do.	6,868	6,215	424	250	6,889	93·6
	November ,,	Do.	5,558	5,230	151	196	5,577	97·1
	December ,,	Do.	5,185	4,809	169	224	5,202	96·6
	January 1873.	Do.	6,687	6,227	184	286	6,697	97·2
	February ,,	Do.	7,025	6,473	303	301	7,077	95·5
	March ,,	Do.	6,560	6,093	187	293	6,573	97·0
		Total...	75,568	69,012	3,068	2,938	75,918	95·7
Rewa' Kantha' Circle.	April 1872.	Whole Circle	1,560	1,504	52	34	1,590	96·6
	May ,,	Do.	1,553	1,494	53	40	1,587	96·5
	June ,,	Do.	1,818	1,720	61	68	1,849	96·5
	July ,,	Do.	1,266	1,233	30	14	1,286	96·9
	August ,,	Do.	1,536	1,436	86	56	1,578	94·3
	September ,,	Do.	1,212	1,149	61	28	1,238	94·9
	October ,,	Do.	1,506	1,438	52	35	1,525	96·5
	November ,,	Do.	1,325	1,285	45	21	1,351	96·6
	December ,,	Do.	1,695	1,632	46	32	1,710	97·2
	January 1873.	Do.	1,822	1,747	32	52	1,831	98·2
	February ,,	Do.	1,760	1,676	47	41	1,764	97·2
	March ,,	Do.	1,735	1,662	35	48	1,745	97·9
		Total...	18,788	17,976	609	469	19,054	96·7
Presidency Circle.	April 1872.	1st, 2nd, 3rd, 4th, & 5th Districts.	2,801	2,292	299	260	2,851	88·4
	May ,,	Do.	1,588	1,276	205	124	1,605	86·1
	June ,,	Do.	1,541	1,242	176	136	1,554	87·5
	July ,,	Do.	1,102	871	148	96	1,115	85·4
	August ,,	1st, 2nd, 3rd, & 4th Districts.	911	768	129	25	922	85·6
	September ,,	1st, 2nd, 3rd, 4th, & 5th Districts.	801	640	208	26	874	75·4
	October ,,	1st, 2nd, 3rd, & 5th Districts.	898	675	183	116	974	78·6
	November ,,	1st, 2nd, 3rd, 4th, & 5th Districts.	999	710	194	118	1,022	78·5

1	2	3	4	5			6	7
Circle of Superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total Number vaccinated.	Results.			Total.	Average percentage Successful, excluding those "Unknown."
				Successful.	Unsuccessful, including "Doubtful."	Unknown.		
Presidency Circle.—*contd.*	December 1872	1st, 2nd, 3rd, and 4th Districts.	1,116	905	158	69	1,132	85·1
	January 1873.	1st, 2nd, 3rd, 4th, & 5th Districts.	1,305	1,084	162	99	1,345	86·9
	February „	Do.	1,633	1,293	293	94	1,680	84·4
	March „	Do.	1,720	1,299	264	186	1,749	83·1
		Total...	16,415	13,055	2,419	1,349	16,823	84·3
Baroda' Circle.	April 1872.	Whole Circle	2,457	2,146	160	151	2,457	93·0
	May „	Do.	2,450	2,127	224	99	2,450	90·4
	June „	Do.	2,370	2,002	200	168	2,370	90·9
	July „	Do.	1,850	1,561	162	127	1,850	90·5
	August „	Do.	2,009	1,781	163	65	2,009	91·6
	September „	Do.	1,988	1,744	170	74	1,988	91·1
	October „	Do.	2,263	1,999	186	78	2,263	91·4
	November „	Do.	2,395	2,170	123	102	2,395	94·6
	December „	Do.	2,685	2,435	152	98	2,685	94·1
	January 1873.	Do.	3,193	2,935	113	145	3,193	96·2
	February „	Do.	3,118	2,810	197	111	3,118	93·4
	March „	Do.	2,630	2,394	134	102	2,630	94·6
	Add — Supplementary Returns.	Do.	253	192	41	20	253	82·4
		Total...	29,661	26,296	2,025	1,340	29,661	92·8
Kutch Circle.	April 1872.	Whole Circle	216	193	15	8	216	92·7
	May „	Do.	135	118	15	2	135	88·7
	June „	Do.	170	152	14	4	170	91·5
	July „	Do.	85	77	7	1	85	91·6
	August „	Do.	60	55	3	2	60	94·8
	September „	Do.	86	75	8	3	86	90·3
	October „	Do.	83	78	4	1	83	95·1
	November „	Do.	114	105	7	2	114	93·7
	December „	Do.	219	206	12	1	219	94·4
	January 1873.	Do.	234	229	5	...	234	97·8
	February „	Do.	225	204	14	7	225	93·5
	March „	Do.	305	299	4	2	305	98·6
		Total...	1,932	1,791	108	33	1,932	94·3

1	2	3	4	5			6	7
Circle of Superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total Number vaccinated.	Results.			Total.	Average pertentage Successful, excluding those "Unknown."
				Successful.	Unsuccessful, including "Doubtful."	Unknown.		
Aden Circle.	April 1872.	Whole Circle	44	36	8	...	44	81·8
	May „	Do.	41	34	7	...	41	82·9
	June „	Do.	12	...	12	...	12	...
	July „	Do.	37	31	6	...	37	83·7
	August „	Do.	45	35	10	...	45	77·7
	September „	Do.	50	40	10	...	50	80·0
	October „	Do.	81	55	26	...	81	67·9
	November „	Do.	68	53	15	...	68	77·9
	December „	Do.	68	42	26	...	68	61·7
	January 1873.	Do.	78	53	25	...	78	67·9
	February „	Do.	64	48	16	...	64	75·0
	March „	Do.	96	63	33	...	96	65·6
		Total...	684	490	194	...	684	71·6
		Grand Total..	561,876	504,762	32,422	32,168	569,352	93·9

N.B.—In this Statement, re-vaccinations are included.

A.—VACCINE DEPARTMENT.

STATEMENT No. III., showing Expenditure of Vaccine Department in each Circle of Superintendence in the Bombay Presidency, for the year 1872-73.

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful Case
A.—PAID BY GOVERNMENT.	Rs. a. p.	Rs. a. p.			
SUPERINTENDENT GENERAL.					
Salary at Rs. 1,150 per mensem	13,800 0 0	9,590 13 6			
Head Clerk at Rs. 80 per mensem	960 0 0	955 0 0			
Clerk at Rs. 40 per mensem...	480 0 0	464 8 3			
Havaldár and Peons at Rs. 10 and 8 each per mensem	408 0 0	408 0 0			
Travelling Allowances ...	2,837 0 0	2,786 11 0			
Contingencies	1,320 0 0	1,425 12 1			
Postal Charges	100 0 0	94 9 6			
Printing Charges	1,560 0 0	1 13 0			
Total ...	21,465 0 0	15,727 3 4	.....	.....	.....
CENTRAL CIRCLE.					
Superintendent's salary at Rs. 700 per mensem ...	8,400 0 0	4,526 6 11			
6 Native Superintendents at Rs. 75 each per mensem ...	5,400 0 0	5,380 10 8			
2 Clerks at Rs. 40 and 25 each per mensem	480 0 0	680 0 0			
Havaldár and Peons at Rs. 10, 8, and 7 each per mensem	816 0 0	805 3 2			
Travelling Allowances ...	2,604 0 0	1,966 10 0			
Contingencies	349 0 0	262 3 6			
Postal Charges	330 0 0	350 11 0			
Total ...	18,379 0 0	13,971 13 3	.....	.....	.....
SOUTHERN CIRCLE.					
Superintendent's salary at Rs. 600 per mensem ...	7,200 0 0	7,557 5 6			
4 Native Superintendents at Rs. 75 each per mensem ..	3,600 0 0	3,555 13 10			
2 Clerks at Rs. 40 and 25 each per mensem	480 0 0	699 2 8			
Havaldár and Peons at Rs. 10, 8, and 7 each per mensem...	648 0 0	642 9 10			
Travelling Allowances ...	2,620 0 0	1,756 4 0			
Contingencies	173 0 0	309 12 11			
Postal Charges	350 0 0	265 0 0			
Total ...	15,071 0 0	14,786 0 9	.....	.....	.....

1	2			3			4	5	6
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of Success, excluding those unknown from the Total.	Cost of each successful Case.
A.—PAID BY GOVERNMENT—*contd.*	Rs.	a.	p.	Rs.	a.	p.			
WESTERN CIRCLE. Superintendent's salary at Rs. 800 per mensem ...	9,600	0	0	7,200	0	0			
4 Native Superintendents at Rs. 75 each per mensem ...	2,700	0	0	2,695	0	0			
Clerk at Rs. 40 per mensem...	480	0	0	479	12	0			
Havaldár and Peons at Rs. 10, 8 and 7 each per mensem ...	564	0	0	559	9	9			
Travelling Allowances ...	2,604	0	0	2,017	13	0			
Contingencies...	346	0	0	253	10	8			
Postal Charges	180	0	0	169	0	0			
Total ...	16,474	0	0	13,374	13	5	.....	.....	.....
NORTHERN CIRCLE. Superintendent's salary at Rs. 350 per mensem ...	4,200	0	0	5,823	5	4			
4 Native Superintendents at Rs. 75 each per mensem ...	3,600	0	0	3,595	0	0			
Clerk at Rs. 40 per mensem...	480	0	0	480	0	0			
Vaccinator at Rs. 14 per mensem	168	0	0	161	14	11			
Havaldár and Peons at Rs. 10 8, and 7 each per mensem	732	0	0	731	1	1			
Travelling Allowances ...	2,620	0	0	1,909	2	0			
Contingencies	300	0	0	187	10	6			
Postal Charges	350	0	0	318	14	0			
Total ...	12,450	0	0	13,206	15	10	1,210	92·7	.....
SINDH CIRCLE. Superintendent's salary at Rs. 600 per mensem	7,200	0	0	6,498	9	2			
4 Native Superintendents at Rs. 100 and 75 each per mensem.	3,900	0	0	3,890	5	2			
Clerk at Rs. 40 do. ...	480	0	0	480	0	0			
Vaccinator at Rs. 18 do. ...	216	0	0	36	0	0			
Havaldár and Peons at Rs 10, 8 and 7 each per mensem...	732	0	0	565	2	8			
Travelling Allowances ...	2,688	0	0	2,576	9	0			
Contingencies	550	0	0	266	12	0			
Postal Charges	350	0	0	193	5	0			
Total ...	16,116	0	0	14,506	11	0	288	100·0	.....

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful case.
A.—PAID BY GOVERNMENT—*contd.*	Rs. a. p.	Rs. a. p.			
KA'THIA'WA'D CIRCLE.					
Superintendent's salary at Rs. 100 per mensem	1,200 0 0	1,200 0 0			
2 Native Superintendents at Rs. 75 each per mensem ...	1,800 0 0	1,800 0 0			
Clerk at Rs. 40 per mensem...	480 0 0	480 0 0			
Vaccinator at Rs. 14 per mensem	168 0 0	163 0 0			
Havaldár and Peons at Rs. 10, 8 and 7 each per mensem.	564 0 0	560 0 0			
Travelling Allowances ...	2,100 0 0	2,006 12 0			
Contingencies...	258 0 0	192 1 3			
Postal Charges	720 0 0	188 6 0			
Total ...	7,290 0 0	6,590 3 3	1,967	86·4	.....
REWA' KANTA' CIRCLE.					
Superintendent's salary at Rs. per mensem ...	.....	.....			
1 Native Superintendents at Rs. 75 per mensem ...	900 0 0	890 15 0			
Clerk at Rs. 40 per mensem...	480 0 0	480 0 0			
Havaldár and Peons at Rs. 10, 8 and 7 each per mensem.	396 0 0	396 0 0			
Travelling Allowances ...	1,058 0 0	1,058 0 0			
Contingencies...	128 0 0	116 12 6			
Postal Charges	20 0 0	55 10 0			
Total ...	2,982 0 0	2,997 5 6	.....	.....	.....
PRESIDENCY CIRCLE.					
Superintendent's salary at Rs. 350 per mensem ...	4,200 0 0	4,200 0 0			
Native Superintendents at Rs. per mensem ...	.....	.....			
Clerk at Rs. per mensem ...	.....	.....			
Havaldár and Peons at Rs. per mensem...	.....	.....			
Travelling Allowances ...	360 0 0	360 0 0			
Contingencies	34 0 0	20 9 3			
Postal Charges	.....	13 3 0			
Europe Animal Lymph Charges	126 3 8	126 3 8			
Total.....	4,720 3 8	4,719 15 11			
Total paid by Government ...	1,14,947 3 8	99,881 2 3	3,465	89·7	.....

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful Case.
E.—Paid by Local Funds.	Rs. a. p.	Rs. a. p.			Rs. a. p.
Central Circle.					
1 Vaccinator at Rs. 24 per mensem	288 0 0	288 0 0	3,147	97·3	
3 do. „ 18 each do.	648 0 0	640 0 7	5,579	97·7	
4 do. „ 14 „ do.	672 0 0	576 10 2	3,548	89·4	
8 Peons „ 7 „ do.	672 0 0	647 15 6	...	.....	
Contingencies per annum ..	192 0 0	61 3 11	...	.....	
Púná Zilhá Total ...	2,472 0 0	2,213 14 2	12,274	95·3	0 3 2
1 Vaccinator at Rs. 24 per mensem	288 0 0	224 5 1	2,250	96·5	
5 do. „ 18 each do.	1,080 0 0	912 3 9	5,475	95·7	
5 do. „ 14 „ do.	840 0 0	890 5 5	8,117	94·8	
11 Peons „ 7 „ do.	924 0 0	865 2 9	...	.....	
Contingencies per annum ..	261 0 0	115 2 1	...	.....	
Ahmadnagar Zilhá Total ...	3,393 0 0	3,007 3 1	15,842	95·3	0 3 4
1 Vaccinator at Rs. 24 per mensem	260 0 0	174 0 0	1,944	97·3	
4 do. „ 18 each do.	864 0 0	770 12 1	4,575	94·8	
5 do. „ 14 „ do.	840 0 0	714 7 6	3,912	88·1	
10 Peons „ 7 „ do.	840 0 0	737 11 9	...	.....	
Contingencies per annum	240 0 0	54 6 0	...	.....	
Násik Zilhá Total ...	3,044 0 0	2,451 5 4	10,431	92·8	0 4 3
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0	1,491	94·2	
2 do. „ 18 each do.	432 0 0	415 13 9	2,977	90·6	
3 do. „ 14 „ do.	504 0 0	487 6 6	4,029	90·6	
6 Peons „ 7 „ do.	504 0 0	504 0 0	...	...	
Contingencies per annum	142 0 0	40 11 6	...	...	
Sholápur Zilhá Total ...	1,870 0 0	1,735 15 9	8,497	91·2	0 3 9
1 Vaccinator at Rs. 24 per mensem.	288 0 0	287 0 0	1,729	99·7	
7 do. „ 18 each do.	1,512 0 0	1,405 12 0	10,340	94·5	
8 do. „ 14 „ do.	1,344 0 0	1,316 2 8	11,088	94·6	
16 Peons „ 7 „ do.	1,344 0 0	1,317 3 3	...	.....	
Contingencies per annum	384 0 0	112 6 11	...	.....	
Khándesh Zilhá Total ...	4,872 0 0	4,438 8 10	23,157	95·0	0 3 3

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number Vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful Case.
	Rs. a. p.	Rs. a. p.			Rs. a. p.
B.—Paid by Local Funds—*contd.*					
Central Circle—*contd.*					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	281 0 7	2,346	93·8	
5 do. „ 18 each do.	1,080 0 0	1,065 0 7	12,449	96·7	
6 do. „ 14 „ do.	1,008 0 0	969 7 11	8,564	94·8	
12 Peons „ 7 „ do.	1,008 0 0	988 3 6	.....	.....	
Contingencies per annum ..	288 0 0	92 9 3	.....	.....	
Sátárá Zilhá Total ...	3,672 0 0	3,396 5 10	23,359	95·7	0 2 8
Circle Total ...	19,323 0 0	17,243 5 0	93,560	94·7	0 3 3
Southern Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
3 do. „ 18 each do.	648 0 0	647 0 0			
4 do. „ 14 „ do.	672 0 0	659 11 1			
8 Peons „ 7 „ do.	672 0 0	672 0 0			
Contingencies per annum ...	192 0 0	11 14 7			
Belgaum Zilhá Total ...	2,472 0 0	2,278 9 8	10,713	87·5	0 4 0
1 Vaccinator at Rs. 24 per mensem.	288 0 0	285 2 10			
5 do. „ 18 each do.	1,080 0 0	1,025 15 6			
5 do. „ 14 „ do.	840 0 0	823 8 7			
11 Peons „ 7 „ do.	924 0 0	911 6 5			
Contingencies per annum ...	264 0 0	35 3 6			
Dhárwád Zilhá Total ...	3,396 0 0	3,081 4 10	11,484	91·4	0 4 11
1 Vaccinator at Rs. 24 per mensem.	288 0 0	287 0 0			
3 do. „ 18 each do.	648 0 0	631 9 0			
5 do. „ 14 „ do.	840 0 0	674 7 1			
9 Peons „ 7 „ do.	756 0 0	686 0 0			
Contingencies per annum ...	216 0 0	6 8 7			
Kánadá Zilhá Total ...	2,748 0 0	2,285 8 8	9,700	89·0	0 4 4

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful Case.
B.—Paid by Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle—*contd.*					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	264 15 4			
3 do. „ 18 each do.	648 0 0	528 0 0			
4 do. „ 14 „ do.	672 0 0	599 5 1			
8 Peons „ 7 „ do.	672 0 0	616 15 8			
Contingencies per annum ...	168 0 0	28 11 2			
Kaládgí Zilhá Total ...	2,472 0 0	2,037 15 3	7,907	92·8	0 4 9
Circle Total ...	11,088 0 0	9,683 6 5	39,804	90·0	0 4 6
Western Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	280 0 0			
5 do. „ 18 each do.	1,080 0 0	1,036 8 0			
5 do. „ 14 „ do.	840 0 0	786 10 9			
11 Peons „ 7 „ do.	924 0 0	894 1 9			
Contingencies per annum ...	264 0 0	71 10 9			
Thánà Zilhá Total ...	3,396 0 0	3,068 15 3	14,831	90·4	0 3 8
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
2 do. „ 18 each do.	432 0 0	425 4 2			
2 do. „ 14 „ do.	336 0 0	327 0 6			
5 Peons „ 7 „ do.	420 0 0	420 0 0			
Contingencies per annum ...	120 0 0	28 13 1			
Kolábá Zilhá Total ...	1,596 0 0	1,489 1 9	7,718	95·6	0 3 3
1 Vaccinator, at Rs. 30 per mensem.	360 0 0	359 0 0			
5 do. „ 18 each do.	1,080 0 0	1,072 0 0			
5 do. „ 14 „ do.	840 0 0	831 0 0			
11 Peons „ 7 „ do.	924 0 0	924 0 0			
Contingencies per annum ...	264 0 0	114 0 6			
Rátnagirí Zilhá Total ...	3,468 0 0	3,300 0 6	37,182	93·0	0 1 6
Circle Total ...	8,460 0 0	7,858 1 6	59,731	92·7	0 2 3

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful Case
B.—Paid by Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Northern Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	283 8 0			
3 do. „ 18 each do.	648 0 0	547 4 9			
3 do. „ 14 „ do.	504 0 0	491 6 8			
7 Peons „ 7 „ do.	588 0 0	577 8 0			
Contingencies per annum ...	168 0 0	82 3 0			
Ahmádábád Zilhá Total ...	2,196 0 0	1,981 14 5	13,067	94·0	0 2 8
1 Vaccinator at Rs. 24 per mensem.	288 0 0	287 12 0			
3 do. „ 18 each do.	648 0 0	645 4 0			
4 do. „ 14 „ do.	672 0 0	516 3 1			
8 Peons „ 7 „ do.	672 0 0	592 1 6			
Contingencies per annum.....	192 0 0	100 1 5			
Khedá Zilhá Total ...	2,472 0 0	2,141 6 0	18,828	9·57	0 1 11
1 Vaccinator at Rs. 24 per mensem.	288 0 0	286 0 0			
1 do. „ 18 do.	216 0 0	210 11 3			
2 do. „ 14 each do.	336 0 0	309 11 1			
4 Peons „ 7 „ do.	336 0 0	336 0 0			
Contingencies per annum ...	96 0 0	47 7 4			
Broach Zilhá Total ...	1,272 0 0	1,189 13 8	6,951	95·5	0 3 0
1 Vaccinator at Rs. 24 per mensem.	288 0 0	287 8 0			
3 do. „ 18 each do.	648 0 0	596 13 1			
4 do. „ 14 „ do.	672 0 0	657 8 9			
8 Peons „ 7 „ do.	672 0 0	669 11 11			
Contingencies per annum ...	192 0 0	93 6 1			
Súrat Zilhá Total ...	2,472 0 0	2,304 15 10	13,223	96·0	0 3 0
Circle Total ...	8,412 0 0	7,618 1 11	52,069	95·3	0 2 6

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success excluding those unknown from the total.	Cost of each successful Case.
B.—Paid by Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Sindh Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
4 do. „ 18 each do.	864 0 0	855 0 0			
4 do. „ 14 „ do.	672 0 0	672 0 0			
9 Peons „ 7 „ do.	756 0 0	752 8 0			
Contingencies. Lymph Allowance ...	108 0 0	77 0 5			
Contingencies. Travelling Allowance to Vaccinators	612 0 0	510 0 0			
Contingencies. Allowance to Superintendent ...	510 10 0	510 10 0			
Karáchí Zilhá Total.....	3,810 10 0	3,665 2 5	10,905	97·8	0 5 7
1 Vaccinator at Rs. 24 per mensem	288 0 0	288 0 0			
6 „ „ 18 each do.	1,296 0 0	1,296 0 0			
6 „ „ 14 „ do.	1,008 0 0	873 0 8			
13 Peons „ 7 „ do.	1,092 0 0	908 10 8			
Contingencies Lymph Allowance ...	156 0 0	148 11 1			
Contingencies Travelling Allowance to Vaccinators	880 0 0	717 8 0			
Contingencies Allowance to Superintendent ...	740 12 0	740 12 0			
Shikárpur Zilhá Total ...	5,460 12 0	5,062 10 5	18,435	98·6	0 4 6
1 Vaccinator at Rs. 30 per mensem	360 0 0	360 0 0			
1 do. „ 24 do.	288 0 0	288 0 0			
5 do. „ 18 each do.	1,080 0 0	1,080 0 0			
5 do. „ 14 „ do.	840 0 0	840 0 0			
12 Peons „ 7 „ do.	1,008 0 0	1,000 6 10			
Contingencies. Lymph Allowance ...	144 0 0	172 14 1			
Contingencies. Allowance to Superintendent ...	548 10 0	548 10 0			
Haidarábád Zilhá Total ...	4,268 10 0	4,289 14 11	22,531	96·4	0 3 3

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of Success, excluding those unknown from the totals	Cost of each successful Case.		
B.—Paid by Local Funds—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Sindh Circle—*contd.*											
1 Vaccinator at Rs. 24 per mensem.	288	0	0	240	0	0					
1 do. „ 18 „	216	0	0	.....							
1 do. „ 14 „	168	0	0	168	0	0					
3 Peons „ 7 each „	252	0	0	140	0	0					
Contingencies per annum	72	0	0	21	4	10					
Upper Sindh Frontier Total...	996	0	0	569	4	10	2,932	97·9	0	3	2
1 Vaccinator at Rs. 24 per mensem.	288	0	0	288	0	0					
2 do. „ 18 each „	432	0	0	252	0	0					
3 do. „ 14 „ „	504	0	0	642	13	4					
6 Peons „ 7 „ „	504	0	0	467	13	3					
Contingencies per annum.....	144	0	0	64	5	2					
Thar and Párkár Total ...	1,872	0	0	1,714	15	9	10,599	97·2	0	2	8
Circle Total ...	16,408	0	0	15,302	0	4	65,402	97·5	0	3	11
Rewa Kanta' Circle.											
1 Vaccinator at Rs. 24 per mensem.	288	0	0	288	0	0					
2 do. „ 18 each „	432	0	0	423	0	0					
2 do. „ 14 „ „	336	0	0	336	0	0					
5 Peons „ 7 „ „	420	0	0	420	0	0					
Contingencies per annum.....	120	0	0	17	0	0					
Circle Total ...	1,596	0	0	1,484	0	0	6,950	97·6	0	3	6
Total paid by Local Funds ...	65,287	0	0	59,188	15	2	317,516	94·7	0	3	3
C.—Paid by Municipalities.											
Central Circle.											
2 Vaccinators at Púná at Rs. 18½ each per mensem.	444	0	0	444	0	0					
2 do. Peons at Púná at Rs. 6 per mensem	144	0	0	144	0	0	1,759	93·4	0	7	4
Do. Contingencies per annum ...	.....			.....							
1 Vaccinator at Khed at Rs. 15 per mensem	180	0	0	161	6	11					
1 do. Peon at Khed at Rs. 6 per mensem.	72	0	0	60	0	0	286	94·6	0	1	4
Do. Contingencies per annum	12	0	0	5	8	0					

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated	Percentage of Success, excluding those unknown from the total.	Cost of each successful case.
C.—PAID BY MUNICIPALITIES—*contd.*					
CENTRAL CIRCLE—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
1 Vaccinator at Náráyangáon and Utur at Rs. 8 per mensem	96 0 0	84 0 0			
Do. Peon at Náráyangáon and Utur at Rs. per mensem.	.....	.....	286	64·3	0 9 8
Do. Contingencies per annum	.....	.....			
1 Vaccinator at Nagar at Rs. 10 per mensem	120 0 0	120 0 0			
Do. Peon at Nagar at Rs. 6 per mensem	72 0 0	72 0 0	1,232	98·1	0 2 6
Do. Contingencies per annum	.....	.....			
1 Vaccinator at Násik at Rs. 15 per mensem	180 0 0	180 0 0			
Do. Peon at Násik at Rs. 6 per mensem	72 0 0	72 0 0	693	93·3	0 7 2
Do. Contingencies per annum	.....	.....			
1 Vaccinator at Sholápur at Rs. 15 per mensem	180 0 0	180 0 0			
Do. Peon at Rs. 7 per mensem	84 0 0	84 0 0	1,216	89·0	0 4 2
Do. Contingencies per annum	.....	.....			
1 Vaccinator at Pandharpur at Rs. 15 per mensem	180 0 0	180 0 0			
Do. Peon at Pandharpur at Rs. 6 per mensem	72 0 0	72 0 0	1,118	99·7	0 5 3
Do. Contingencies per annum	.....	.....			
1 Vaccinator at Bársí at Rs. 15 per mensem	180 0 0	180 0 0			
Do. Peon at Bársí at Rs. 6 per mensem	72 0 0	72 0 0	822	87·1	0 7 1
Do. Contingencies per annum	6 0 0	.....			
1 Vaccinator at Bárámatí at Rs. 12 per mensem	144 0 0	144 0 0			
Do. Peon at Bárámatí at Rs. 6 per mensem.	72 0 0	72 0 0	481	90·2	0 8 6
Do. Contingencies per annum.	12 0 0	.....			
1 Vaccinator at Dhúliá at Rs. 15 per mensem	180 0 0	180 0 0			
1 Do. Peon at Dhúliá at Rs. per mensem	.....	.....	795	100·0	0 3 9
Do. Contingencies per annum	12 0 0	8 1 0			

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each Successful case.		
C.—Paid by Municipalities—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Central Circle—*contd.*											
1 Vaccinator at Sátárá at Rs. 15 per mensem.	180	0	0	180	0	0					
Do. Peon at Sátárá at Rs. 5 per mensem.	60	0	0	60	0	0	1,323	95·1			
Do. Contingencies per annum	.....			.....					0	3	5
1 Vaccinator at Wálwá at Rs. 15 per mensem.	180	0	0	122	5	5					
Do. Peon at Wálwá at Rs. 6 per mensem.	72	0	0	72	0	0	1,591	98·3	0	2	0
Do. Contingencies per annum	18	0	0	6	14	11					
1 Vaccinator at Karhád at Rs. 15 per mensem.	180	0	0	180	0	0					
Do. Peon at Karhád at Rs. 6 per mensem.	72	0	0	72	0	0	1,630	93·9	0	3	8
Do. Contingencies per annum	18	0	0	18	0	0					
1 Vaccinator at Kháu ápur at Rs. 15 per mensem.	180	0	0	180	0	0					
Do. Peon at Khánápur at Rs. 6 per mensem.	72	0	0	72	0	0	869	57·3	0	11	3
Do. Contingencies per annum	18	0	0	18	0	0					
1 Vaccinator at Málsiras at Rs. 15 per mensem.	180	0	0	180	0	0					
Do. Peon at Málsiras at Rs. 6 per mensem.	72	0	0	72	0	0	845	87·7	0	6	7
Do. Contingencies per annum	18	0	0	18	0	0					
Total.....	3,006	0	0	3,766	4	3	14,946	91·9	0	5	1
Southern Circle											
1 Vaccinator at Belgáon at Rs. 10 per mensem.	120	0	0	120	0	0					
Do. Peon at Belgáon at Rs. 6 per mensem.	72	0	0	72	0	0	543	85·3	0	6	10
Do. Contingencies per annum	1	8	0	1	8	0					
1 Vaccinator at Hublí at Rs. 12 per mensem.	144	0	0	162	1	7					
Do. Peon at Hublí at Rs. per mensem.	.....			.....			1,167	92·2	0	2	6
Do. Contingencies per annum	0	9	8	0	9	8					
1 Vaccinator at Gadak at Rs. 15 per mensem.	180	0	0	180	0	0					
Do. Peon Gadak, at Rs. per mensem	.....			.....			666	89·0	0	5	7
Do. Contingencies per annum	.....			.....							

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of Success, excluding those unknown from the total.	Cost of each successful case.
C.—Paid by Municipalities.—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle—*contd.*					
1 Vaccinator at Bágalkot at Rs. 18 per mensem	212 0 0	212 0 0			
Do. Peon at Bágalkot at Rs. 7 per mensem.	84 0 0	84 0 0	917	96·0	0 6 4
Do. Contingencies per annum.	12 0 0	5 8 4			
1 Vaccinator at Kaládgí at Rs. 12½ per mensem	150 0 0	148 0 0			
Do. Peon at Kaládgí at Rs. per mensem.	.....	.....	714	87·1	0 3 11
Do. Contingencies per annum	6 0 0	3 5 3			
1 Vaccinator at Bijápur at Rs. 10-3-4 per mensem.	122 8 0	122 8 0			
Do. Peon at Bijápur at Rs. 5 per mensem.	60 0 0	60 0 0	679	93·8	0 5 4
Do. Contingencies per annum.	12 0 0	12 0 0			
1 Vaccinator at Gokák at Rs. per mensem	.....	.....	31	90·0	.....
Total.....	1,176 9 8	1,183 8 10	4,717	91·0	0 4 9
Western Circle.					
1 Vaccinator at Tháná at Rs. 14 per mensem.	168 0 0	168 0 0			
Do. Peon at Tháná at Rs. 7 per mensem.	84 0 0	84 0 0	247	85·8	1 3 5
Do. Contingencies per annum.	.....	.....			
1 Vaccinator at Panwel and Uran at Rs. 18 per mensem.	216 0 0	216 0 0			
Do Peon at Panwel and Uran at Rs. 7 per mensem	84 0 0	84 0 0	861	92·4	0 6 5
Do. Contingencies per annum.	.....	.....			
Total.....	552 0 0	552 0 0	1,108	90·9	0 9 3
Northern Circle.					
2 Vaccinators at Ahmadábád at Rs. 20 each per mensem.	480 0 0	480 0 0			
Do. Peons at Ahmadábád at Rs. 7 each per mensem.	168 0 0	168 0 0	4,913	95·4	0 2 3
Do. Contingencies per annum.	12 0 0	9 8 0			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
C.—PAID BY MUNICIPALITIES—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
NORTHERN CIRCLE—*contd.*					
1 Vaccinator at Dholká at Rs. 12 per mensem.	144 0 0	52 6 8			
Do. Peon at Dholká at Rs. 6 per mensem.	72 0 0	31 5 8	339	100·0	0 4 1
Do. Contingencies per annum.	3 0 0	1 4 11			
1 Vaccinator at Veramgáon at Rs. 12 per mensem.	144 0 0	126 5 5			
Do. Peon at Veramgáon at Rs. 7 per mensem.	84 0 0	84 0 0	565	92·5	0 7 4
Do. Contingencies per annum.	3 0 0	3 0 0			
1 Vaccinator at Dhanduká at Rs. 15 per mensem.	180 0 0	180 0 0			
Do. Peon at Dhanduká at Rs. 6 per mensem.	72 0 0	70 4 2	1,244	89·0	0 4 4
Do. Contingencies per annum.	24 0 0	24 0 0			
1 Vaccinator at Nariád at Rs. 18 per mensem.	216 0 0	185 0 6			
Do. Peon at Nariád at Rs. 6 per mensem.	72 0 0	72 0 0	982	94·9	0 5 1
Do. Contingencies per mensem.	12 0 0	12 0 0			
1 Vaccinator at Broach at Rs. 13 per mensem.	156 0 0	120 12 5			
Do. Peon at Broach at Rs. 6 per mensem.	72 0 0	72 0 0	960	96·1	0 4 3
Contingencies per annum.	12 0 0	12 0 0			
1 Vaccinator at Súrat at Rs. 13 per mensem.	156 0 0	154 0 3			
Do. Peon at Súrat at Rs. 6 per mensem.	72 0 0	72 0 0	2,453	93·0	0 1 11
Do. Contingencies per annum.	24 0 0	24 0 0			
Total...	2,178 0 0	1,954 0 0	11,456	94·2	0 3 1
SINDH CIRCLE.					
2 Vaccinators at Karáchí at Rs. 15 each per mensem.	360 0 0	360 0 0			
Do. Peons at Kárachí at Rs. per mensem.	.....	.....	3,983	88·0	0 2 3
Do. Contingencies per annum.	115 13 0	115 13 0			
1 Vaccinator at Shikárpur at Rs. 24 per mensem.	288 0 0	288 0 0			
Do. Peon at Shikárpur at Rs. 6 per mensem.	72 0 0	72 0 0	1,452	92·1	0 4 4
Do. Contingencies per annum.	3 12 0	3 12 0			

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
C.—Paid by Municipalities—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Sindh Circle—*contd.*											
1 Vaccinator at Sakkhar at Rs. 20 per mensem.	240	0	0	240	0	0					
Do. Peon at Sakkhar at Rs. 7 per mensem.	84	0	0	84	0	0	1,196	93·9	0	6	6
Do. Contingencies per annum	36	0	0	23	12	0					
1 Vaccinator at Háidárabad, at Rs. 20 per mensem.	240	0	0	240	0	0					
Do. Peon at Háidárabad at Rs. 7 per mensem.	84	0	0	84	0	0	1,597	97·9	0	3	7
Do. Contingencies per annum.	24	0	0	24	0	0					
Total...	1,547	9	0	1,535	5	0	8,228	91·5	0	3	5
Presidency Circle.											
1 Head Vaccinator at Rs. 45 per mensem.	540	0	0	540	0	0					
5 Vaccinators at Rs. 24 each per mensem.	1,440	0	0	1,440	0	0					
4 Assistant Vaccinators at Rs. 18 each per mensem.	864	0	0	864	0	0					
1 Apprentice Vaccinator at Rs. 14 per mensem.	168	0	0	168	0	0					
11 Peons at Rs. 11 each per mensem.	1,452	0	0	1,452	0	0					
Contingencies including expenses on account of Animal Vaccination.	1,921	6	3	1,921	6	3					
Total ...	6,385	6	3	6,385	6	3	16,415	84·3	0	7	9
Aden.											
2 Vaccinators at Aden at Rs. 18 each per mensem	432	0	0	432	0	0					
1 Do. Peon at Aden at Rs. 10 per mensem.	120	0	0	120	0	0	684	71·6	0	14	2
Do. Contingencies per annum.	.....			.....							
Total ...	552	0	0	552	0	0	684	71·6	0	14	2
Total paid by Municipalities.	16,297	8	11	15,928	8	4	57,554	82·1	0	5	10

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
D.—Paid by Native Chiefs or Landlords.											
Central Circle. 1 Vaccinator paid by Akalkot State at Rs. 15 per mensem.	180	0	0	180	0	0					
Do. Peon paid by Akalkot State at Rs. 3 per mensem.	36	0	0	36	0	0	1,548	89·9	0	2	9
Do. Contingencies per annum.	12	0	0	12	0	0					
1 Vaccinator paid by Penth State at Rs. 17½ per mensem.	210	0	0	187	6	0					
Do. Peon paid by Penth State at Rs. 6 per mensem.	72	0	0	66	0	0	534	93·6	0	8	2
Do. Contingencies per annum.	12	0	0	3	6	0					
1 Vaccinator paid by Jat State at Rs. 12 per mensem.	144	0	0	144	0	0					
Do. Peon paid by Jat State at Rs. 4 per mensem.	48	0	0	48	0	0	771	97·6	0	4	1
Do. Contingencies per annum.	.....			.....							
1 Vaccinator paid by Atpadí State at Rs. 12 per mensem.	144	0	0	144	0	0					
Do. Peon paid by Atpadí State at Rs. 4 per mensem.	48	0	0	48	0	0	730	98·6	0	4	3
Do. Contingencies per annum.	.....			.....							
1 Vaccinator paid by Bhor State at Rs. 15 and 21 per mensem.	252	8	0	234	0	0					
Do. Peon paid by Bhor State at Rs. 4½ per mensem.	54	0	0	54	0	0	1,083	99·7	0	4	4
Do. Contingencies per annum.	.....			.....							
1 Vaccinator paid by Phalton State at Rs. 10 per mensem.	120	0	0	120	0	0					
Do. Peon paid by Phalaton State at Rs. 4 per mensem.	54	12	0	54	12	0	965	81·9	0	4	7
Do. Contingencies per annum.	4	8	0	4	8	0					
Circle Total.....	1,391	4	0	1,336	0	0	5,631	92·4	0	4	4

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
D.—Paid by Native Chiefs or Landlords—*continued.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Southern Circle. 1 Vaccinator paid by Sánglí at Rs. 12½ per mensem,	150	0	0	149	8	0					
Do. Peon paid by Sánglí at Rs. 4½ per mensem.	54	0	0	54	0	0	812	85·9	0	5	6
Do. Contingencies per annum.	6	6	0	6	6	0					
2 Vaccinators paid by Miraj, at Rs. 27 per mensem.	324	0	0	324	0	0					
1 do. Peon paid by Miraj at Rs. 8 per mensem.	96	0	0	96	0	0	1,231	99·9	0	6	3
Do. Contingencies per annum.	56	0	0	56	0	0					
2 Vaccinators paid by Kurandwád at Rs. 18 per mensem.	216	0	0	216	0	0					
1 do. Peon paid by Kurandwád at Rs. 8 per mensem.	96	0	0	96	0	0	929	85·2	0	7	1
Do. Contingencies per annum.	75	0	0	75	0	0					
1 Vaccinator paid by Mudhol at Rs. 10 per mensem.	120	0	0	118	6	3					
Do. Peon paid by Mudhol at Rs. 6 per mensem.	72	0	0	72	0	0	913	51·1	0	7	0
Do. Contingencies per annum.	.....			.....							
1 Vaccinator paid by Rámdrug at Rs. 10 per mensem.	120	0	0	113	13	0					
Do. Peon paid by Rámdrug at Rs. 4 per mensem.	48	0	0	48	0	0	467	82·9	0	7	5
Do. Contingencies per annum.	6	0	0	6	0	0					
2 Vaccinators paid by Jamkhand at Rs. 20 per mensem.	240	0	0	240	0	0					
1 do. Peon paid by Jamkhandí at Rs. 10 per mensem.	120	0	0	120	0	0	1,090	59·8	1	1	5
Do. Contingencies per annum.	.....			.....							
1 Vaccinator paid by Sávanur at Rs. 15 per mensem	180	0	0	180	0	0					
Do. Peon paid by Sávanur at Rs. 7 per mensem.	84	0	0	84	0	0	515	89·8	0	9	0
Do. Contingencies per annum.	9	3	0	9	3	0					
Southern Márátha States Total	2,072	9	0	2,064	4	3	5,957	82·2	0	7	7

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
D.—Paid by Native States or Landlords—*contd.*	Rs. a. p.	Rs a. p.			Rs. a. p.
Southern Circle—*contd.* 1 Vaccinator at Rs. 18 per mensem.	216 0 0	216 0 0			
1 do. „ 16 per mensem.	192 0 0	189 8 0			
1 do. „ 15 per mensem.	180 0 0	180 0 0			
7 do. „ 14 per mensem.	1,176 0 0	1,176 0 0			
1 do. „ 13 per mensem.	156 0 0	156 0 0			
10 Peons at Rs. 4-11-2 each per mensem.	564 0 0	564 0 0			
Contingencies per annum...	258 0 0	258 0 0			
1 Assistant Superintendent at Rs. 75 per mensem.	900 0 0	710 14 1			
Contingencies per annum...	17 14 6	17 14 6			
Kolhápur States Total...	3,659 14 6	3,468 4 7	19,545	95·2	0 2 11
Circle Total...	5,732 7 6	5,532 8 10	25,502	92·3	0 4 0
Western Circle: 1 Vaccinator paid by Jawár at Rs. 16 per mensem.	192 0 0	192 0 0	1,081	98·9	0 2 10
1 Vaccinator paid by Janjírá, at Rs. 20 per mensem.	240 0 0	235 0 0	1,364	94·3	0 3 5
1 Vaccinator paid by Sáwantwádí, at Rs. 15 per mensem.	180 0 0	180 0 0			
Do. Peon paid by Sáwantwádí at Rs. 6 per mensem.	72 0 0	72 0 0	6,528	91·1	0 0 9
2 Extra Peons paid by Sáwantwádí, at Rs. 2 each per mensem.	48 0 0	48 0 0			
Contingencies per annum...	.....	.....			
Circle Total ...	732 0 0	727 0 0	8,973	92·5	0 1 5
Northern Circle. 1 Vaccinator paid by the Díwán Sáheb of Pálanpur, at Rs. 22 per mensem.	264 0 0	264 0 0			
1 Vaccinator paid by the Díwán Sáheb of Pálanpur, at Rs. 15 per mensem.	180 0 0	180 0 0	4,086	99·1	0 2 3
2 do. Peons paid by the Díwán Saheb of Pálanpur, at Rs. 5 each per mensem.	120 0 0	114 0 0			
Contingencies per annum ...	12 0 0	12 0 0			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
	Rs. a. p.	Rs. a. p.			Rs. a. p.
D.—Paid by Native States or Landlords—*continued.*					
NORTHERN CIRCLE—*contd.*					
1 Vaccinator paid by H. E. the Nawáb of Rádhanpur, at Rs. 18 per mensem	216 0 0	216 0 0	2,373	87·1	0 2 4
Do. Peon paid by H. E. the Nawáb of Rádhanpur, at Rs. 5 per mensem.	60 0 0	60 0 0			
1 Vaccinator paid by the Thákurs of Wáw, Tharád, Morwádá, Sántalpur, Charchat, Wárye, Deodar, Bhábhar, Teharwádá and Suigám at Rs. 22 per mensem...	264 0 0	259 0 0	1,928	99·1	0 2 8
1 Peon for the above at Rs. 5 per mensem.	60 0 0	60 0 0			
Paid from the Fine Fund of the Pálanpur Political Superintendency—					
1 Vaccinator at Rs. 20 per mensem.	240 0 0	230 0 0	3,460	97·3	0 2 11
1 Vaccinator at Rs. 18 do.	216 0 0	216 0 0			
2 do. Peons at Rs. 6 each per mensem.	144 0 0	144 0 0			
Pálanpur States Total.....	1,776 0 0	1,755 0 0	11,847	96·3	0 2 7
2 Vaccinators paid by H. H. the Mahárájá of I'dar, at Rs. 20 each per mensem.	480 0 0	408 0 0			
2 do. Peons at Rs. 5 and 6 each per mensem.	132 0 0	132 0 0	3,208	93·0	0 3 2
Contingencies per annum	24 0 0	24 0 0			
Postal Charges.	.....	1 10 0			
Paid from subscriptions of the Mahí Kánthá Thákurs—					
3 Vaccinators at Rs. 20 each per mensem.	720 0 0	541 0 0			
Contingencies per annum	36 0 0	36 0 0	3,706	86·6	0 2 11
Postal Charges	.....	7 1 0			
Mahí Kánthá States Total ...	1,392 0 0	1,149 11 0	6,914	89·5	0 3 0

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated.	Percentage of success, excluding those unknown from the Total.	Cost of each successful case.
	Rs. a. p.	Rs. a. p.			Rs. a. p.
D.—Paid by Native States or Landlords—*contd.*					
Northern Circle—*contd.*					
1 Vaccinator paid by H. E. the Nawáb of Cambay, at Rs. 20 per mensem...	240 0 0	238 0 0	1,855	99·9	0 2 6
1 Peon for do. at Rs. 4½ per mensem	54 0 0	54 0 0			
1 Vaccinator paid by H. H. the Rájá of Dharmpur, at Rs. 15 per mensem	180 0 0	175 0 0	2,189	93·1	0 2 2
1 Peon for the above at Rs. 6 per mensem.	72 0 0	72 0 0			
Contingencies per annum.	18 0 0	18 0 0			
1 Vaccinator paid by H. H. the Ráj of Bánsdá at Rs. 15 per mensem.	180 0 0	120 0 0	1,457	98·8	0 2 1
Peon do. at Rs. 6 do.	72 0 0	48 0 0			
Contingencies per annum.	18 0 0	12 0 0			
Petty States' Total...	834 0 0	737 0 0	5,501	97·0	0 2 3
Circle Total...	4,002 0 0	3,641 11 0	24,262	94·5	0 2 7
Sindh Circle.					
1 Vaccinator paid by Mír Alí Murád of Khairpur, at Rs. 25 per mensem...	300 0 0	300 0 0			
Peon do. at Rs. 7 do. ...	84 0 0	84 0 0	1,941	79·1	0 4 2
Contingencies per annum.	.....	.....			
Circle Total...	384 0 0	384 0 0	1,941	79·1	0 4 2
Ka'thiaw'a'd Circle.					
1 Head Vaccinator at Rs. 30 per mensem	.....	357 13 4			
2 Head Vaccinators at Rs. 25 each per mensem	.....	542 0 0			
1 Vaccinator at Rs. 25 per mensem	.....	277 8 0			
2 Vaccinators at Rs. 20 each per mensem	.....	350 0 0			
5 Assistant Vaccinators at Rs. 18 each per mensem	.....	1,028 2 1			
9 Assistant Vaccinators at Rs. 15 each per mensem	.....	1,418 13 2			

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the Total.	Cost of each successful case		
	Rs.	a.	p.	Rs.	a.	p			Rs.	a.	p.
D.—Paid by Native Chiefs or Landlords—*contd.*											
Kathiáwá'd Circle—*contd.*											
13 Apprentice Vaccinators at Rs. 14 each per mensem	.....			1,884	11	9					
2 Candidate Vaccinators at Rs. 4 each per mensem	.....			55	0	0					
Chief's allowance to Superintendent at Rs. 50 per mensem	.....			600	0	0					
4 Agents at Rs. 5 each per mensem	.....			240	0	0					
33 Peons at Rs. 7 each per mensem	.....			2,639	0	0					
Bháttá to Vaccinators.....	.....			2,187	0	0					
Contingencies	.....			789	13	0					
Circle Total...	11,917	0	0	12,369	13	4	73,601	96·5	0	2	10
Rewá' Kánthá' Circle.											
2 Vaccinators paid by Lúnwádá at Rs. 18 each per mensem.	432	0	0	432	0	0	1,726	96·8	0	5	5
Do. Peons do. at Rs. 5½ each per mensem.	126	0	0	126	0	0					
1 Vaccinator paid by Rájpíplá at Rs. 15-11-4 per mensem	188	8	0	188	8	0	3,306	94·3	0	2	6
Do. at Rs. 18-5-3 per mensem...	219	15	0	219	15	0					
2 Peons do. at Rs. 4-5-10 each per mensem	104	12	0	104	12	0					
1 Vaccinator paid by Báriá at Rs. 20 per mensem.	240	0	0	240	0	0	3,692	98·0	0	2	7
Do. do. at Rs. 18 do.	216	0	0	216	0	0					
2 Peons do. at Rs. 5-4-0 each per mensem	126	0	0	126	0	0					
1 Vaccinator paid by Bálásinur at Rs. 13 per mensem...	156	0	0	149	8	0	728	93·3	0	2	10
1 do. paid by Chotá Udaipur at Rs. 18 per mensem...	216	0	0	216	0	0	510	87·3	0	9	2
Peon do. at Rs. 3½ do.	42	0	0	42	0	0					
1 Vaccinator paid by Sunth & Kadáná at Rs. 18 per mensem...	216	0	0	207	0	0	944	98·2	0	3	7
1 do. paid by Sankhedá Mewás at Rs. 18 per mensem.	216	0	0	216	0	0	932	99·0	0	4	10
1 Peon do. at Rs. 4 per mensem.	48	0	0	48	8	0					
Circle Total...	2,547	3	0	2,531	11	0	11,838	96·1	0	3	7

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
D.—Paid by Native Chiefs or Landlords—*contd.*											
Baroda Circle. 1 Native Superintendent at Rs. 27 per mensem	324	0	0	324	0	0					
Travelling allowance to do.											
do. at Rs. 27 per mensem.	324	0	0	324	0	0					
Bhattá to do. for 6 months											
do. at Rs. 15 per mensem.	90	0	0	90	0	0					
1 Vaccinator at Rs. 25 per mensem	300	0	0	300	0	0					
6 Vaccinators at Rs. 18 each per mensem.	1,296	0	0	1,296	0	0					
11 Vaccinators at Rs. 15 each. per mensem.	1,980	0	0	1,980	0	0					
Contingent allowance to all Vaccinators and Superintendent at Rs. 10 per mensem	120	0	0	120	0	0					
1 Clerk at Barodá at Rs. 30 per mensem.	360	0	0	360	0	0					
2 Peons do. at Rs. 9 each per mensem.	216	0	0	216	0	0					
18 Peons do. at Rs. 7 each per mensem.	1,512	0	0	1,512	0	0					
For Káthiáwád Districts											
1 Vaccinator at Rs. 35-10-0 per mensem.	427	8	0	427	8	0					
1 Vaccinator at Rs. 22 per mensem.	264	0	0	264	0	0					
3 Vaccinators at Rs. 20 each per mensem.	720	0	0	720	0	0					
5 Peons at Rs. 8 each per mensem	480	0	0	480	0	0					
Total Barodá Rs...	8,413	8	0	8,413	8	0					
Equivalent to Company's Rs. ...	7,085	1	0	7,085	8	0					
Circle Total...	7,085	1	0	7,085	1	0	29,661	92·8	0	4	3

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case		
D.—Paid by Native Chiefs or Landlords—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Kutch Circle. 2 Vaccinators paid by H. H. the Ráo of Kutch, at Rs. 12-10 each per mensem	303	0	0	303	0	0	1,494	95·4	1	0	2
3 Vaccinators paid by H. H. the Ráo of Kutch, at Rs. 7-12-0 each per mensem	279	0	0	279	0	0					
4 Peons paid by H. H. the Ráo of Kutch, at Rs. 3-14 each per mensem.	186	0	0	186	0	0					
Contingencies per annum.	642	0	0	642	0	0					
Paid by Bháyáds.											
4 Vaccinators at Rs. 12-10 each per mensem.	606	0	0	606	0	0	438	90·4	1	15	3
Contingencies per annum.	172	10	0	172	10	0					
Circle Total...	2,188	10	0	2,188	10	0	1,932	94·3	1	3	6
Total paid by Native Chiefs or Landlords.....	35,979	9	6	35,796	7	2	183,341	94·3	0	3	5
Grand Total...	232,511	6	1	410,795	0	11	561,876	93·9	0	6	8

N.B.—In this statement re-vaccinations are included.

A.—VACCINE DEPARTMENT.

CIVIL.

STATEMENT No. IV., showing Results of the Year 1872-73, *as compared with those of each of the previous five years, in the Bombay Presidency.*

1	2	3	4	5				6	7	8	9
				No. of Vaccinators.							
Year.	Total Number of Persons vaccinated.	Number Successful.	Ratio per Cent. Successful, excluding those "Unknown" from the Total.	A. Paid by State.	B. Paid from other sources.	C. Total.	D. No. previously employed as Inoculators or Private Practitioners.	Cost of whole Vaccine Establishment.	Cost of Travelling Allowances and Contingencies.	Total Cost.*	Cost of each Successful Case.
								Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
1867	356,446	333,638	96·7	134	118	252	.....	.....*	.....*	.....*	0 5 7
1868	393,865	370,216	97·3	134	126	260	.....	.....*	.....*	1,11,524 0 0	0 4 2
1869-70	424,774	397,622	96·7	134	141	275	.....	1,18,389 0 0	17,812 0 0	1,36,201 0 0	0 5 6
1870-71	491,605	447,048	95·0	134	192	326	.....	1,42,536 0 0	27,515 0 0	1,70,051 0 0	0 6 0
1871-72	526,402	484,095	94·8	3	370	373	.....	1,56,331 0 0	28,128 5 2	1,84,459 5 2	0 6 1
1872-73	561,876	504,762	93·9	2	371	373	.....	1,77,848 4 0	32,946 12 11	2,10,795 0 11	0 6 8

* These columns cannot be filled up correctly, because we have no account of Municipalities' and Native States' expenditure.

B.

DISPENSARY VACCINATION.

B.—DISPENSARY VACCINATION.

STATEMENT No. V., showing particulars of Vaccination in the Dispensaries in each Circle of Superintendence, in the Bombay Presidency, during the Year 1872-73.

1	2	3		4		5		6		7	8	9																10				11		12
												PRIMARY VACCINATIONS.																RE-VACCINATIONS.				Percentage of Successful Cases, excluding those "unknown" from the Total.		
												A.		B.					C.		D.			E.				A.	B.	C.	D.			
												SEX.		CASTE					AGE.		RESULT.													
Circle of Medical Superintendence.	Name and Rank of Superintendents of Dispensary.	No. of Native Superintendents of Vaccination attached to the Dispensary.		No. of Vaccinators attached to the Dispensary.		Total Number of Persons vaccinated.		Collectorate, Political Agency or Native State for the population of which the Dispensary is provided.		Population of Area included in the last column.	Name of Dispensary.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful; including those doubtful.	Unknown.	Total.	In Primary Vaccinations.	In Re-Vaccinations	Average Number of Persons vaccinated by each Vaccinator.
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.																											
		...	...	...	...	811	616	Púná.	Púná Town.	80,416	Khán Bahádur Pestanjí Sorábjí's Dispensary.	408	315	9	655	41	5	13	334	389	405	81	237	723	27	62	11	100	83·3	30·3	811
		...	...	...	...	158	289		Juner.....	10,298	Dispensary	85	73	...	144	14	...	...	46	112	127	9	22	158	...	...	...	...	91·9	...	158
		...	...	...	...	78	159		Indápur....	7,740	Do.	33	45	2	63	11	...	2	21	57	68	8	4	80	...	...	...	...	89·4	...	78
		...	...	...	...	39	...		Sáswad	6,432	Do.	19	20	...	39	..	...	...	15	24	39	...	...	39	...	...	...	...	100·0	...	39
		...	...	...	...	65	...		Sírúr	5,049	Do.	33	32	4	41	17	...	3	29	36	59	5	2	66	...	...	...	...	92·1	...	65
		...	...	...	...	1,151	1,064			109,935		578	485	15	942	83	5	18	445	618	698	103	265	1,066	27	62	11	100	87·1	30·3	230
		...	...	...	...	78	37	Ahmadnagar.	Ahmadnagar.	39,000	Civil Hospital Dispensary.	47	31	1	54	17	...	6	44	34	78	...	...	78	...	...	...	...	100·0	...	78
		...	...	...	...	10	...		Sangamner..	9,978	Dispensary.	5	5	...	10	...	...	...	9	1	7	3	...	10	...	...	...	...	70·0	...	10
		...	...	...	...	88	37			48,978		52	36	1	64	17	...	6	53	35	85	3	...	88	...	...	...	...	96·5	...	88
		...	...	...	...	77	64	Násik	Penth.....	8,573	Dispensary	52	25	...	64	13	...	...	23	54	77	...	...	77	...	..	...	...	100·0	...	77
		...	...	...	...	227	208		Iolí	15,444	Do.	135	92	...	121	103	...	3	77	150	154	46	27	227	...	...	...	...	77·0	...	227
		...	...	...	...	304	272			24,017		187	117	...	185	116	...	3	100	204	231	46	27	304	...	...	...	...	83·3	...	152

TRAL. JOHN ROBB, M.B., Assistant Surgeon.

CEN-	P. S. TURNBULL, M. D., Surgeon; Acting—	...	...	...	...	514	575	Sholápur.	Sholápur Town.	53,403	Dispensary	275	231	2	327	117	...	60	62	244	477	35	11	523	2	6	...	8	93·1	25·0	514
		...	...	...	...	108	119		Pandharpur	16,275	Do.	48	60	...	104	4	...	...	72	36	100	3	5	108	...	...	...	...	97·0	...	108
		...	...	...	...	44	95		Bársí	18,560	Do.	31	13	...	42	2	...	...	19	25	32	13	2	47	...	...	...	...	71·1	...	44
		...	...	...	...	273	273		Akalkot ..	8,372	Do.	140	133	...	189	84	...	...	153	120	253	3	20	276	...	...	...	...	98·8	...	273
		...	...	...	...	939	1,062			96,610		494	437	2	662	207	...	60	506	425	862	54	38	954	2	6	...	8	94·1	25·0	234
		...	...	...	...	110	232	Khándesh.	Dharmgáon.	10,385	Bhil Corps Hospital.	55	25	...	67	13	...	...	51	29	72	8	...	80	26	4	...	30	90·0	86·6	110
		...	...	...	...	236	301		Irandol	11,071	Dispensary	123	111	...	198	36	...	...	82	152	201	7	26	234	2	...	...	2	96·6	100·0	236
		...	...	...	...	232	951		Párolá	12,076	Do.	128	104	...	187	45	...	...	84	148	225	14	1	240	...	...	...	...	94·1	...	232
		...	...	...	...	578	1,484			33,532		306	240	...	452	94	...	...	217	329	498	29	27	554	28	4	...	32	94·4	87·5	192
		...	...	...	...	255	333	Sátára.	Karhád	22,949	Dispensary	134	121	...	219	36	...	...	122	133	254	2	1	257	...	...	...	...	99·2	...	255
		...	...	...	...	542	268		Wái.....	10,560	Do.	282	259	...	455	42	...	44	128	413	530	3	8	541	...	1	...	1	99·4	...	542
		...	...	...	...	164	...		Islámpur ..	...	Do.	81	83	...	153	11	...	...	79	85	129	22	17	168	...	...	...	...	85·4	...	164
		...	...	...	...	229	65		Máhábaleshwar.	1,655	Do.	62	79	7	68	66	...	...	34	107	130	13	4	147	29	58	1	88	90·9	39·6	229
		...	...	...	...	1,190	666			35,164		1,759	542	7	895	155	...	44	363	738	1,043	40	30	1,113	29	59	1	89	96·3	32·9	297
Grand Total of the Central Circle.		...	...	...	...	4,250	4,585			348,236		2,176	1,857	25	3,200	672	5	131	1,684	2,349	3,415	277	387	4,079	86	131	12	229	92·4	39·6	212
SOUTHERN.	J. RABY, Assistant Surgeon; Acting— H. A. LEWIS, Surgeon.	...	...	...	...	...	...	Belgaon.	Belgáon	26,947	Dispensary	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
		...	...	...	...	84	143		Gokák	12,612	Do.	40	44	...	60	23	...	1	20	64	76	8	...	84	...	...	...	...	90·4	...	84
		...	...	...	...	99	...		Athní	9,988	Do.	59	39	...	92	6	...	...	47	51	77	16	5	98	1	...	...	1	82·7	100·0	99
		...	...	...	...	183	143			49,547		99	83	...	152	29	...	1	67	115	153	24	5	182	1	...	...	1	83·6	100·0	91
		...	...	...	...	...	29	Dhárwád.	Gadak	8,069	Dispensary	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
		...	...	...	...	79	...		Hublí.....	34,793	Do.	42	37	1	53	25	...	...	25	54	58	21	...	79	...	...	...	...	73·4	...	79
		...	...	...	...	79	29			42,862		42	37	1	53	25	...	...	25	54	58	21	...	79	...	...	...	...	73·4	...	79

1	2	3.		4		5		6	7	8	9												10				11		12
Circle of Medical Superintendence.	Name and Rank of Superintendent of Dispensary.	No. of Native Superintendents of Vaccination attached to the Dispensary.		No. of Vaccinators attached to the Dispensary.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State for the population of which the Dispensary is provided.	Population of Area included in the last column.	Name of Dispensary.	PRIMARY VACCINATIONS.												RE-VACCINATIONS.				Percentage of Successful Cases, excluding those "unknown" from the Total.		Average Number of Persons Vaccinated by each Vaccinator.
											A.		B.					C.		D.			E.	A.	B.					
											SEX.		CASTE.					AGE.		RESULT.								In Primary Vaccinations.	In Re-vaccinations.	
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.				Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.			
SOUTHERN—*continued.*	J. RABY, Assistant Surgeon; Acting E. A. LEWIS, Surgeon—*continued.*	...	...	...	...	639	...	Kánara. Kárwár Town.	9,921	Civil Hospital ...	156	108	38	196	23	...	7	29	235	227	39	...	266	208	201	1	410	85·3	50·8	6·9
		...	...	...	...	1470	...	Kárwár Town.	...	Dispensary.	706	632	286	989	62	1	...	214	1,124	1,237	183	8	1,428	85	54	3	142	87·1	61·1	1,470
		...	...	...	...	28	203	Ilápur.....	1,324	Do.	12	11	5	13	5	...	...	6	17	18	2	5	25	1	4	...	5	90·0	20·0	28
		...	...	...	...	50	8	Honáwar ..	4,586	Do.	61	58	40	59	20	...	...	16	103	104	13	2	119	9	1	...	10	88·8	90·0	129
		...	...	...	...	129	102	Mundegod..	970	Do.	44	6	1	15	34	..	...	...	50	50	...	...	50	...	...	...	..	100·0	...	50
		...	...	...	...	109	183	Sirsí	4,927	Do.	70	39	11	77	21	...	...	18	91	86	32	...	118	...	...	...	...	72·8	...	109
		...	...	...	...	81	22	Haliál.....	4,100	Do.	35	46	10	56	15	...	...	19	62	59	22	...	81	...	...	...	...	72·8	.	81
		...	...	...	...	7	...	Supá	454	Do.	3	4	..	7	..	...	...	1	6	...	7	...	7	...	...	...	...	...	...	7
		...	...	...	...	633	674	Kumptá....	6,739	Do.	313	290	34	539	30	...	...	87	516	553	53	30	636	16	10	4	30	91·2	61·5	65
		...	...	...	...	3,146	1,192		33,021		1,400	1,194	425	1,951	210	1	7	390	2,204	2,334	351	45	2,730	319	270	8	597	86·9	54·1	349
		...	...	...	...	82	...	Kaládgi. Bágalkot ...	14,002	Dispensary ...	45	37	...	64	18	..	...	50	32	77	5	...	82	...	...	...	..	93·9	...	82
		...	...	...	...	20	...	Bíjápur ..	6,592	Do. ...	9	11	...	19	...	...	1	8	12	12	6	2	20	...	...	...	..	66·6	...	20
		...	...	...	...	102	...		20,594		54	48	...	83	18	...	1	58	44	89	11	2	102	...	...	...	...	89·0	...	51
Circle Total.		...	...	...	...	3,510	1,364		146,024		1,595	1,362	426	2,239	282	1	9	540	2,417	2,634	407	52	3,093	320	270	8	593	86·6	54·2	250
		...	...	...	...	32	...	Kánara. Thána Town	14,299	Civil Hospital...	22	10	...	30	2	...	...	14	18	32	...	...	32	...	...	...	...	100·0	...	32
		...	...	...	...	92	31	Thána Town		Dispensary ...	40	52	17	60	6	8	1	27	65	77	15	...	92	...	...	...	...	83·6	...	92
		...	...	...	...	66	90	Bándorá ...	7,227	Do. ...	31	35	21	35	4	2	4	27	39	59	6	1	66	...	...	...	...	90·7	...	66
		...	...	...	...	207	194	Kalián	12,804	Do. ...	115	85	...	124	66	10	...	72	128	170	15	19	204	1	6	...	7	91·8	14·2	207
		...	...	...	...	98	92	Kurlá.....	2,700	Do. ...	58	40	25	67	6	...	...	27	71	60	19	19	98	...	...	...	...	75·9	...	98
		...	...	...	...	...	8	Uran	8,690	Do. ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
		...	...	...	...	45	24	Bhiwandí ..	15,607	Do. ...	19	26	...	36	9	...	...	16	29	23	20	2	45	...	...	...	...	53·5	...	45

Western.	T. Copy, Assistant Surgeon.	...	...	...	...	105	...	Thá-	Bassein	9,356	Do. ...	64	41	20	58	4	...	23	36	69	77	28	...	105	..	...	...	...	73·3	...	1·5
		...	...	...	...	109	...		Kelví Máhim.....	7,183	Do. ...	60	45	...	105	...	...	...	36	69	72	41	...	113	1	3	...	4	63·7	25·0	10
		...	...	...	...	10	...		Mátheran ...	...	Do. ...	7	2	2	6	1	...	...	1	8	8	1	...	9	1	...	...	1	88·8	100·0	10
		...	...	...	...	764	439			77,866		416	336	85	521	98	20	28	256	496	578	145	41	764	3	9	...	12	79·9	25·0	84
		...	...	...	...	207	272	Kolá'a.	Alibág	5,473	Dispensary	114	93	4	182	6	...	15	96	111	198	9	...	207	...	...	...	...	95·6	...	207
		...	...	...	...	61	77		Pen	6,514	Do.	27	33	...	59	1	...	...	31	29	53	8	2	63	...	1	...	1	86·8	...	61
		...	...	...	...	268	349			11,987		141	126	4	241	7	...	15	127	140	251	17	2	270	...	1	...	1	93·6	...	134
		...	...	...	...	310	269	Ratnágiri.	Dápulí	8,972	Dispensary	159	151	1	298	10	1	...	142	168	253	59	6	318	...	...	...	...	81·0	...	310
		...	...	...	...	173	335		Vingurlá ..	10,618	Do.	84	89	3	152	18	...	...	80	93	139	16	19	174	...	...	...	...	89·6	...	173
		...	...	...	...	636	...		Sáwántwádí	8,017	Do.	154	154	40	220	46	2	...	115	193	281	34	4	319	206	120	2	328	89·2	63·1	636
		...	...	...	...	1,119	604			27,607		397	394	44	670	74	3	...	337	454	673	109	29	811	206	120	2	328	86·0	63·1	373
Circle Total...		...	...	...	...	2,151	1,392			117,460		954	856	133	1,432	179	23	43	720	1,090	1,502	271	72	1,845	209	130	2	341	84·7	61·6	153
Northern.	Manchehji Behramji Cola', M. D.	...	...	...	...	101	202	Ahmadábád.	Sádrá	6,749	Máhi Kánta Agency Dispensary.	55	37	...	78	13	1	...	53	39	55	30	7	92	2	6	1	9	64·7	25·0	101
		...	...	...	...	224	89		Veramgáon.	19,661	Dispensary	109	113	...	172	50	...	...	200	22	197	17	8	222	1	1	...	2	92·0	50·0	224
		...	...	...	...	256	163		Sánaud	7,229	Do.	150	81	...	223	8	...	...	186	45	221	6	4	231	20	1	4	25	97·3	95·2	256
		...	...	...	...	209	222		Prántej	8,341	Do.	111	98	...	150	59	...	...	143	66	198	11	...	209	...	...	...	...	94·7	...	209
		...	...	...	...	489	335		Dholká	20,854	Do.	238	246	...	349	135	...	...	393	91	397	32	55	484	5	...	...	5	92·5	100·0	489
		...	...	...	...	...	...		Dhanduká.	9,732	Do.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
		...	...	...	...	247	184		Dholerá....	12,468	Do.	139	108	...	221	26	...	...	143	104	222	9	16	247	...	...	...	...	96·4	...	247
		...	...	...	...	197	311		Gogo	9,571	Do.	95	102	3	133	61	...	...	134	63	149	37	12	198	...	...	...	...	80·1	...	197
		...	...	...	...	1,723	1,506			94,655		897	785	3	1,326	352	1	...	1,252	430	1,439	142	102	1,683	28	8	5	41	91·0	77·7	216
		...	...	...	...	484	169	Kheda.	Kapatbanj	13,982	Dispensary	252	224	...	292	184	...	...	322	154	446	8	25	479	5	3	...	8	98·2	62·5	484
		...	...	...	...	91	79		Mahamudabád.	8,065	Do.	55	35	...	66	24	...	...	40	50	70	14	7	91	1	...	...	1	83·3	100·0	91
		...	...	...	...	193	96		Mahudhá ...	9,384	Do.	103	90	...	115	52	...	26	117	76	174	14	5	193	...	...	...	...	92·5	...	193
		...	...	...	...	186	112		Dúkor.....	7,740	Do.	103	76	...	175	4	...	...	84	95	165	19	6	190	3	6	...	9	89·6	33·3	186
		...	...	...	...	20	78		Nariád	24,551	Do.	12	8	...	16	4	...	...	10	10	10	3	7	20	...	...	...	...	76·9	...	20
		...	...	...	...	322	373		Borsad	12,314	Do.	192	130	4	282	35	1	...	228	94	290	21	11	322	...	...	...	...	98·2	...	322
		...	...	...	...	1,296	907			75,896		717	563	4	946	303	1	26	801	479	1,155	69	61	1,295	9	9	...	18	93·5	50·0	216
		...	...	...	...	471	113	Broach.	Jambusar ...	11,634	Dispensary	245	226	...	342	129	...	...	308	163	459	2	10	471	...	...	...	...	99·5	...	471
		...	...	...	...	67	33		Ankleshwar	9,414	Do.	41	26	...	42	25	...	...	44	23	61	3	3	67	...	...	...	...	95·3	...	67
		...	...	...	...	63	62		Hánsot	4,152	Do.	33	30	...	55	8	...	...	33	30	59	...	4	63	...	...	...	...	100·0	...	63
		...	...	...	...	110	94		Eláo	1,915	Do.	54	47	...	77	...	24	...	61	40	91	9	4	104	6	...	5	11	91·0	100·0	110
		...	●	..	...	711	352			87,115		373	329	...	516	162	24	...	446	256	670	14	21	705	6	...	5	11	97·9	100·0	177

1	2	3		4		5		6	7	8	9																10				11		12
											PRIMARY VACCINATIONS.																RE-VACCINATIONS.				Percentage of successful Cases, excluding those "unknown" from the Total.		
											A.		B.					C.		D.			E.										
											SEX.		CASTE.					AGE.		RESULT.													
Circle of Medical Superintendence.	Name and Rank of Superintendent of Dispensary.	No. of Native Superintendents of Vaccination attached to the Dispensary.		No. of Vaccinators attached to the Dispensary.		Total Number of Persons vaccinated.		Collectorate, Political Agency or Native State for the population of which the Dispensary is provided.	Population of Area included in the last column.	Name of Dispensary.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccinations.	In Re-Vaccinations.	Average Number of Persons vaccinated by each Vaccinator.
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.																										
NORTHERN—*contd.*	MANCHARJI BERAMJI COLA, M. D.—*contd.*	...	...	...	...	208	242	Sirsat. Rándír	10,312	Dispensary	115	93	...	178	30	...	...	149	59	191	17	...	208	...	...	...	...	91·8	...	208
		...	...	...	...	210	15	Mándví	3,946	Do.	104	106	...	197	10	3	...	89	121	201	6	4	211	...	...	...	...	97·1	...	210
		...	...	...	...	70	14	Bárdolí	4,020	Do.	33	37	...	61	9	...	...	44	26	68	2	...	70	...	...	...	...	97·1	...	70
		...	...	...	...	102	21	Chiklí	2,500	Do.	62	38	...	76	24	...	...	64	36	94	6	...	100	...	2	...	2	94·0	...	102
		...	...	...	...	185	179	Balsád	10,500	Do.	99	86	2	138	41	4	...	124	61	146	23	17	186	...	...	...	...	86·3	...	185
		...	...	...	...	150	64	Párdí	4,003	Do.	80	70	...	134	16	...	...	59	91	144	12	...	156	...	...	...	...	92·3	...	150
		...	...	...	...	86	128	Nawsárí	1,532	Do.	50	36	...	56	2	28	...	49	37	85	1	...	86	...	...	...	...	98·8	...	86
		...	...	...	...	1011	663		36,813		543	466	2	810	132	35	...	578	431	929	67	21	1,017	...	2	...	2	93·2	...	144
Circle Total.		...	...	...	...	4,741	3,428		294,479		2,530	2,143	9	3,628	949	61	26	3,077	1,596	4,193	302	205	4,700	43	19	10	72	93·2	69·3	197
Surgeon.		...	...	...	...	39	...	Karáchí. Karáchí	80,000	Dispensary	26	6	...	10	21	1	...	9	23	32	...	...	32	4	3	...	7	100·0	57·1	39
		...	...	...	...	13	...	Manorá	500	Do.	6	6	3	1	8	...	...	6	6	12	...	...	12	1	...	...	1	100·0	100·0	13
		...	...	...	...	61	49	Ketí Bandar	2,000	Do.	30	31	...	35	26	...	...	17	44	47	...	14	61	...	...	...	...	100·0	...	61
		...	...	...	...	177	119	Mírpur Batorá	500	Do.	105	71	...	56	120	...	...	90	86	156	6	17	179	...	...	1	1	96·2	...	177
		...	...	...	...	109	146	Tátá	7,500	Do.	60	49	...	46	63	...	...	39	70	82	17	16	115	...	...	...	...	82·8	...	109
		...	...	...	...	48	112	Jarak	2,000	Do.	31	17	...	24	24	...	...	15	33	42	6	...	48	...	...	...	...	87·5	...	48
		...	...	...	...	62	73	Bulá Khán's Tándá	1,600	Do.	31	31	...	13	49	...	...	32	30	57	1	4	62	...	...	...	...	98·2	...	62
		...	...	...	...	105	35	Sehwán	5,500	Do.	65	40	1	47	57	...	...	35	70	98	7	...	105	...	...	...	...	93·3	...	105
		...	...	...	...	614	534		103,600		354	251	4	232	368	1	...	243	362	526	37	51	614	5	3	1	9	93·4	62·5	76
		...	...	...	...	32	84	Shikárpur. Mehar	3,500	Dispensary	20	12	...	16	16	...	...	26	6	31	...	1	32	...	...	...	...	100·0	...	32
		...	...	...	...	243	304	Ládkháná	6,000	Do.	129	114	...	120	122	...	1	141	102	220	13	10	243	...	...	...	...	94·4	...	243
		...	...	...	...	...	203	Sakkhar	31,000	Do.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
		...	...	...	...	537	398	Rohrí	10,000	Do.	343	194	...	193	344	...	...	377	160	515	2	20	537	...	...	...	...	99·6	...	537
		...	...	...	...	812	989		50,500		492	320	...	329	482	...	1	544	268	766	15	31	812	...	...	...	...	98·0	...	279

| | | |

1	2	3		4		5		6	7	8	9																	10				11		12
											Primary Vaccinations.																	Re-vaccinations.				Percentage of Successful Cases, excluding those "unknown" from the Total.		Persons
											A.		B.					C.		D.			E.				A.	B.	C.	D.			
											Sex.		Caste.					Age.		Result.														
Circle of Medical Superintendence.	Name and Rank of Superintendent of Dispensary.	No. of Native Superintendents of Vaccination attached to the Dispensary.		No. of Vaccinators attached to the Dispensary.		Total Number of Persons vaccinated.		Collectorate, Political Agency, or Native State for the population of which the Dispensary is provided.	Population of Area included in the last column.	Name of Dispensary.	Males.	Females.	Christian.	Hindú.	Musulmán.	Pársi.	Other Caste.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	In Primary Vaccinations.	In Re-vaccinations.	Average Number of each Vaccinator.
		1872-73.	1871-72.	1872-73.	1871-72.	1872-73.	1871-72.																											
Rewá Kánthá	S. B. Halliday, Assistant Surgeon.	...	...	...	...	422	380	Panch Mahals. Godhrá ...	10,641	Dispensary	167	189	...	153	181	...	22	257	99	333	14	9	356	28	30	8	66	95·9	48·2	422
		...	...	...	...	65	85	Native State. Báriá	2,891	Dispensary	37	28	...	60	3	...	2	31	34	63	2	...	65	...	...	...	...	96·9	..	65
	Circle Total.	...	...	...	...	487	465		13,532		204	217	...	213	184	...	24	288	133	396	16	9	421	28	30	8	66	96·1	48·2	243
Kutch.	Dorabji Hormasji G.G.M.C.	...	...	...	...	162	241	Kutch Native State. Bhúj	23,742	Dispensary	87	69	...	73	77	6	...	60	96	149	7	...	156	5	1	...	6	95·5	83·3	162
		...	...	...	...	138	495	Mándví ...	35,912	Do.	65	70	...	33	102	...	...	34	101	125	2	8	135	3	...	...	3	98·4	100·0	138
	Circle Total.	...	...	...	...	300	736		59,654		152	139	...	106	179	6	...	94	197	274	9	8	291	8	1	...	9	96·8	88·8	150
Grand Total		...	...	...	...	17,951	14,315		1,187,685		9,093	7,592	600	11,981	3,758	98	248	7,556	9,129	14,652	1,429	857	16,938	702	584	41	1,327	91·1	54·3	183

Details of Column 5.

Total number of *persons* vaccinated	17,951
Deduct *persons* re-vaccinated	1,266
Number of *persons* primarily vaccinated	16,685

Details of Primary Vaccinations.

Total number of *operations* (Col. 9 E.)	16,938
Deduct *persons* vaccinated	16,685
Number of *operations* in excess of *persons*	253

Details of Re-vaccinations.

Total number of *operations* (Col. 10 D.)	1,327
Deduct *persons* vaccinated	1,266
Number of *operations* in excess of *persons*	61

C.—VACCINE DEPARTMENT.

STATEMENT No. VI. showing particulars of Vaccination in the Bombay Army, 1872-73.

European Army.	Number successfully vaccinated.								
	Europeans.				Natives.				Total.
	Males.	Females.	Children.	Total.	Males.	Females.	Children.	Total.	
Regiments.....	820	97	403	1,320	...	...	4	4	1,324
Line	...	...	...	.....	2	...	139	141	141
Bazars	..	...	...	.....	...	1	51	52	52
Total.....	820	97	403	1,320	2	1	194	197	1,517

Native Army.	Number of Vaccinators.		Total number of persons vaccinated.		Strength.			Primary Vaccinations.												Re-vaccinations.				Percentage of successful cases, excluding those unknown from the Total.	
								Sex.		Caste.					Age.		Result.				Result.					
	1		2		3			4		5					6		7			8	9			10	11	
	1872-73.	1871-72.	1872-73.	1871-72.	Europeans.	Natives.	Total.	Males.	Females.	Christians.	Hindus.	Musalmáns.	Parsis.	Other Castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful and doubtful.	Unknown.	Total	Successful.	Unsuccessful and doubtful.	Uknown.	Total.	In Primary Vaccination.	In Re-vaccination.
Regiments.....	..	..	4,490	4,599	865	43,501	44,366	1,377	1,210	60	1,890	559	..	78	1,576	1,011	2,370	320	16	2,706	755	1,115	41	1,911	88·1	40·3
* Camp Followers.	3	3	2,523	2,722	1,947	46,050	47,997	1,315	1,080	153	1,610	546	35	51	1,779	616	2,257	137	75	2,469	73	78	2	153	94·2	48.3
Total....	3	3	7,013	7,321	2,812	89,551	92,363	2,692	2,290	213	3,500	1,105	35	129	3,355	1,627	4,627	457	91	5,175	828	1,193	43	2,064	91·0	40·9

* Regmental Lines or Bazar and Cantonment Bazar.

Details of Column 2.

Total number of *persons* vaccinated	7,013
Deduct *persons* re-vaccinated	2,031
Number of *persons* primarily vaccinated	4,982

Details of Primary Vaccinations.

Total number of *operations* (Col. 8)	5,175
Deduct *persons* vaccinated	4,982
Number of *operations* in excess of *persons*	193

Details of Re-vaccinations.

Total number of *operations* (Col. 10)	2,064
Deduct *persons* vaccinated	2,031
Number of *operations* in excess of *persons*	33

RETURN of Small-pox in Native Army for 1872-73.

		Remained.	Admitted.	Total.	Recovered.	Died.	Remaining.	Total.	Previously vaccinated.
Regiment.....	Males.....	13	69	82	69	1	12	82	64
	Females.....	2	33	35	23	2	10	35	27
	Children	5	95	100	72	2	26	100	82
Regimental Lines or Bazárs.....	Males.....	2	8	10	6	1	3	10	5
	Females.....	2	8	10	8	1	1	10	8
	Children	6	50	56	42	1	13	56	23
	Total.....	30	263	293	220	8	65	293	209

STATEMENT No. VII.

SUMMARY of the Diaries of Superintendents of Vaccination and their Assistants for the Year 1872-73.

Circle.	Superintendent.	Assistant Superintendent.	Collectorate.	Name of Táluká.	Number of Encampments.			Number of Travelling Days.			Number of Miles travelled.			Number of Villages visited.			Number of vaccinated Children inspected.			Total Number of Children vaccinated during the year 1872-73.
					Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	
Assistant Surgeon.	Trimbak Anant.		Púná.	Haweli	10	19	29	10	46	56	123	326	449	7	56	63	379	1,898	2,277	4,906
				Máwal	..	24	24	..	33	33	..	254	254	..	70	70	..	1,556	1,556	1,932
				Khed	..	22	22	..	35	35	..	420	420	..	64	64	..	923	923	1,884
				Juner	..	9	9	..	14	14	..	159	159	..	33	33	..	331	331	912
				Purandhar	3	18	21	11	25	36	121	231	352	19	36	55	938	1,994	2,932	2,049
				Sirúr	1	17	18	3	28	31	32	253	285	2	33	35	93	523	616	1,035
				Indápur	..	23	23	..	35	35	..	373	373	..	55	55	..	1,113	1,113	940
				Bhimthadí	..	33	33	..	47	47	..	514	514	..	84	84	..	1,803	1,803	1,428
	1	1			14	165	179	24	263	287	276	2,530	2,806	28	431	459	1,410	10,141	11,551	15,086
	Dharmá Bápují.		Ahmadnagar.	Nagar	3	14	17	13	31	44	117	239	356	20	60	80	631	765	1,396	3,482
				Ráhurí	2	12	14	10	44	54	89	300	389	21	32	53	707	1,628	2,335	988
				Párner	1	11	12	3	23	26	31	206	237	8	42	50	285	724	1,009	959
				Srigundí	..	5	5	..	17	17	..	116	116	..	26	26	..	442	442	1,405
				Karjat	..	4	4	..	19	19	..	149	149	..	23	23	..	534	534	1,643
				Newásá	..	6	6	..	19	19	..	165	165	..	25	25	..	483	483	1,854
				A'nkolá	..	6	6	..	16	16	..	187	187	..	23	23	..	642	642	1,542
				Jámkhed	..	6	6	..	15	15	..	105	105	..	19	19	..	497	497	1,975
				Kopargáon	2	20	22	4	47	51	41	299	340	6	64	70	308	1,026	1,334	913
				Sangamner	..	13	13	..	28	28	..	284	284	..	58	58	..	625	625	1,210
				Siogáon	..	3	3	..	15	15	..	116	116	..	26	26	..	419	419	1,103
	1	1			8	100	108	30	274	304	278	2,222	2,500	55	393	448	1,931	7,785	9,716	17,074

Rámji Khandesh.	Násik.	Násik	..	6	6	..	29	29	..	178	178	..	32	32	..	386	386	1,095
		Igatpurí	..	28	28	..	37	37	..	290	290	..	61	61	..	1,873	1,873	1,587
		Niphád	..	23	23	..	26	26	..	174	174	..	75	75	..	456	456	820
		Chándúr	1	17	18	..	17	17	..	162	162	..	35	35	..	488	488	828
		Sinnar	..	16	16	..	18	18	..	157	157	..	31	31	..	691	691	981
		Máligám	..	13	13	..	12	12	..	149	149	..	30	30	..	1,133	1,133	1,944
		Bágián	..	13	13	..	13	13	..	77	77	..	24	24	..	573	573	1,237
		Nándgám	3	17	20	8	20	28	75	156	231	8	24	32	368	192	560	485
		Sáwargáon	2	30	32	6	38	44	47	280	327	10	53	63	175	364	539	618
		Dindori	..	34	34	..	38	38	..	238	238	..	45	45	..	1,889	1,889	1,529
		Native States. Penth	..	25	25	..	36	36	..	315	315	..	83	83	..	1,559	1,559	534
1	1		6	222	228	14	284	298	122	2,176	2,298	18	473	491	543	9,604	10,147	11,658
Bálájí Ganesh.	Sholápur.	Sholápur	..	57	57	..	71	71	..	242	242	..	68	68	..	3,523	3,523	3,420
		Mádhé	..	33	33	..	33	33	..	265	265	..	33	33	..	830	830	1,189
		Karmálá	..	51	51	..	54	54	..	455	455	..	64	64	..	1,682	1,682	2,003
		Pandharpur	..	58	58	..	67	67	..	289	289	..	62	62	..	2,630	2,630	2,609
		Sángolá	..	25	25	..	26	26	..	102	102	..	25	25	..	444	444	837
		Bársi	..	42	42	..	41	41	..	236	236	..	40	40	..	927	927	1,595
		Native State. Akalkot	..	46	46	..	59	59	..	198	198	..	59	59	..	1,685	1,685	1,548
1	1		..	317	317	..	356	356	..	1,787	1,787	..	356	356	..	11,721	11,721	13,201
Bálkrishna Gopál.	Khándesh.	Dhúliá	2	3	5	3	28	31	34	288	322	5	29	34	301	763	1,064	2,685
		Sáwadá	3	2	5	2	3	5	19	32	51	5	10	15	352	264	616	1,366
		Nasirábád	3	8	11	5	9	14	55	84	139	9	31	40	596	505	1,101	1,146
		Trandoi	2	7	9	3	21	24	25	526	551	5	35	40	314	809	1,123	2,669
		Jámner	3	7	10	5	12	17	40	108	148	8	29	37	708	920	1,628	2,161
		Sherpur	..	5	5	..	28	28	..	311	311	..	41	41	..	835	835	809
		Sháháde	..	1	1	..	11	11	..	157	157	..	22	22	..	356	356	956
		Talode	..	3	3	..	7	7	..	127	127	..	9	9	..	262	262	246
		Nandurbár	..	2	2	..	13	13	..	134	134	..	19	19	..	283	283	1,314
		Chálisgáon	2	5	7	2	7	9	26	92	118	5	3	8	446	213	659	1,260
		Pimpalner	..	2	2	..	10	10	..	139	139	..	18	18	..	330	330	1,902
		Páchorá	3	5	8	12	19	31	128	136	264	22	9	31	958	204	1,162	860
		Chopde	..	4	4	..	13	13	..	178	178	..	24	24	..	907	907	1,819
		Amalner	2	1	3	6	13	19	57	206	263	7	36	43	409	706	1,115	1,489
		Virdal	1	9	10	1	19	20	14	197	211	..	32	32	..	1,201	1,201	2,171
		Bhosáwal	2	3	5	3	8	11	30	59	89	9	9	18	233	346	579	1,099
1	1		23	67	90	42	221	263	428	2,774	3,202	75	356	431	4,317	8,904	13,221	23,952
Bálkrishna Rájarám.	Sátárá.	Sátárá	2	30	32	4	69	73	55	535	590	4	79	83	156	2,463	2,619	4,616
		Tásgáon	..	11	11	..	14	14	..	113	113	..	29	29	..	1,022	1,022	1,768
		Jáwalí	..	13	13	..	13	13	..	137	137	..	35	35	..	630	630	1,897
		Wái	3	3	6	3	12	15	41	127	168	7	29	36	380	808	1,188	2,346
		Khatáw	..	6	6	..	18	18	..	151	151	..	31	31	..	811	811	1,459
		Wálwá	3	18	21	4	20	24	56	157	213	6	51	57	155	1,971	2,126	4,942
		Mán	..	12	12	..	17	17	..	134	134	..	27	27	..	458	458	910

Circle.	Superintendent.	Assistant Superintendent.	Collectorate.	Táluká.	Number of Encampments.			Number of Travelling Days.			Number of Miles travelled.			Number of Villages visited.			Number of vaccinated Children inspected.			Total Number of Children vaccinated during the year 1872-73.
					Superintendent.	Assistant Superintendant.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	
CENTRAL—*continued*	P. S. TURNBULL, M.D.; Acting—J. ROSS, M.B	Bálkrishná Rájáram—*contd.*	Sátárá—*contd.*	Karhád	4	6	10	3	13	16	51	118	169	3	24	27	123	869	992	3,462
				Khánápur	..	11	11	..	21	21	..	212	212	..	50	50	..	1,067	1,067	1,838
				Pátan	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	2,578
				Málsiras	..	24	24	..	28	28	..	213	213	..	58	58	..	1,514	1,514	2,097
				Koregám	..	1	1	..	2	2	..	18	18	..	5	5	..	128	128	1,704
				Native States. Bhor	4	9	13	9	10	19	90	54	144	26	25	51	594	263	857	1,083
				Native States. Ját	..	12	12	..	14	14	..	242	242	..	24	24	..	324	324	771
				Native States. A'tpadí	..	2	2	..	1	1	..	11	11	..	2	2	..	29	29	730
				Native States. Phaltan	..	4	4	..	12	12	..	99	99	..	20	20	..	664	664	965
	1	1	1		16	162	178	23	264	287	293	2,321	2,614	46	489	535	1,408	13,021	14,429	33,166
	1	6	6		67	1,033	1,100	133	1,662	1,795	1,397	13,810	15,207	222	2,498	2,720	9,609	61,176	70,785	114,137
		Venkatráo Subráo.	Belgáum.	Belgáum	8	28	36	4	79	83	45	454	499	1	44	45	72	814	886	2,071
				Sampgáon	1	27	28	1	28	29	8	245	253	1	54	55	20	1,141	1,161	1,731
				Parasgarh	1	14	15	1	23	24	18	243	261	1	35	36	77	830	907	1,241
				Gokák	..	15	15	..	32	32	..	350	350	..	53	53	..	775	775	1,801
				Chikodí	7	26	33	9	38	47	142	390	532	9	51	60	406	1,106	1,512	2,123
				Bídí	2	17	19	2	47	49	31	423	454	3	84	87	194	1,353	1,447	1,744
				Athní	5	16	21	5	21	26	63	212	275	2	31	33	59	246	345	576
				Southern Maratha State. Sánglí	4	..	4	12	..	12	103	40	143	10	6	16	239	60	299	812
				Southern Maratha State. Míraj	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,231
				Southern Maratha State. Kurandwád	2	..	2	6	2	8	43	20	63	9	1	10	261	18	279	929
				Southern Maratha State. Mudhol	3	..	3	3	..	3	36	..	36	5	..	5	127	..	127	913
				Southern Maratha State. Rámdurg	1	..	1	1	..	1	18	..	18	1	..	1	15	..	15	467
				Southern Maratha State. Jamkhandí	1	..	1	1	..	1	9	..	9	1	..	1	59	..	59	1,090
		1	1		35	143	178	45	270	315	516	2,377	2,893	43	359	402	1,529	6,343	7,872	16,729
		Rangó.		Dhárwád....	..	30	30	..	56	56	..	553	553	..	89	89	..	1,124	1,124	2,146
				Nawalgund..	..	3	3	..	8	8	..	136	136	..	27	27	..	301	301	957
				Bankápur	2	8	10	2	17	19	25	151	176	1	33	34	25	526	551	1,613

| Swámiráo | Dhárwár. | | |

Circle.			Name of Táluká.	Number of Encampments.			Number of Travelling Days.			Number of Miles travelled.			Number of Villages visited.			Number of vaccinated Children inspected.			Total Number of Children vaccinated during the year 1872-73.
Superintendent.	Assistant Superintendent.	Collectorate.		Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	
WESTERN.																			
T. Cory, Assistant Surgeon.																			
Bálaji Máyáji.		1	Sátára	2	13	15	2	32	34	108	261	369	1	19	20	19	451	470	1,345
			Basein		10	10		13	13		161	161		15	15		385	385	1,286
			Bhiwandi		16	16		23	23		107	107		35	35		669	669	2,246
			Kalyán		29	31	6	36	42	78	296	374	14	33	47	290	829	1,219	1,185
			Dhárá	2	23	25		26	26		652	652		35	35		865	865	1,476
			Karjat		18	22	6	23	28	71	236	307	15	49	64	318	466	784	1,471
			Máhim	4	35	39		48	48		258	258	7	34	39		385	385	787
			Murbád		2	2	4	7	11	39	91	130		11	11	123	4	127	1,333
			Panvel	1	1	2		2	2		69	69		1	1		30	30	2,423
			Shahpur		4	4		7	7		18	18		4	4		45	45	1,672
			Wáda		8	8		21	21		226	226		35	35		348	348	902
			Native State. Jawár																1,081
		1		9	159	168	18	237	255	296	2,375	2,671	37	285	322	855	4,277	5,132	17,020
Bálaji Máyáji.		1	Alibág	4	30	34	8	53	61	83	328	411	24	103	127	291	741	1,032	1,739
			Mángaon	3	44	47	5	74	79	51	330	381	14	122	136	175	1,321	1,496	1,709
			Mahád	2	12	14	7	23	30	76	116	192	15	54	69	196	959	1,155	1,133
			Pen	2	40	42	3	67	70	30	443	473	17	121	138	172	1,315	1,487	2,332
			Roha	2	32	34	4	40	44	31	239	270	11	84	95	55	720	775	900
			Native State. Janjira	1	6	7	1	7	8	40	25	65	1	6	7	4	194	198	1,264
		1		14	164	178	28	264	292	311	1,481	1,792	82	490	572	897	5,430	6,327	9,082
			Ratnágiri	6	18	24	13	36	49	121	219	340	11	3	14	280	168	448	2,344
			Chiplún	6	5	11	10	29	39	92	229	321	17	21	38	1,140	608	1,748	6,065
			Dápuli	2	14	16	5	41	46	32	472	504	4	43	51	114	1,124	1,241	2,673

Northern.	Mancharjí Berámjí Cola', M.D.	Bálájí Krishnájí.	Ratnágirí.	Deogarh	2	20	22	2	29	31	60	240	300	1	36	37	20	1,639	1,659	5,340	
				Gohágarh	2	17	19	4	21	25	26	235	261	8	9	17	231	598	859	2,378	
				Málwan	6	27	33	8	43	51	162	494	656	11	49	60	902	2,610	3,512	7,340	
				Rájápur	10	30	40	13	48	61	131	525	656	11	48	59	646	1,920	2,566	7,233	
				Sangameshwar	7	7	14	10	18	28	109	129	238	7	18	25	411	634	1,045	3,003	
				Native State. Sáwantwádí	3	7	10	3	6	9	60	105	165	4	7	11	226	382	608	6,528	
		1	1		44	145	189	66	276	342	793	2,648	3,441	74	238	312	4,000	9,686	13,686	43,710	
	1	3	3		67	468	535	112	777	889	1,400	6,504	7,904	193	1,013	1,206	5,752	19,393	25,145	69,812	
		Sardármiyá Nánámiyá.	Ahmadábád.	Daskroi	1	11	12	1	42	43	144	565	709	..	48	48	..	1,365	1,365	7,099	
				Dholká	..	5	5	..	20	20	..	327	327	..	42	42	..	927	927	2,458	
				Dhandúká	..	15	15	..	39	39	..	448	448	..	46	46	..	1,790	1,790	2,819	
				Veramgáon	3	1	4	14	7	21	183	123	306	30	16	46	853	183	1,036	2,931	
				Sánand	..	8	8	..	23	23	..	363	363	..	47	47	..	877	877	1,503	
				Prántej	4	7	11	7	21	28	70	237	307	22	28	50	549	569	1,0[illegible]	1,577	
				Gogo	..	19	19	..	32	32	..	408	408	..	62	62	..	2,093	2,093	2,241	
		1	1		8	66	74	22	184	206	397	2,471	2,868	52	289	341	1,402	7,749	9,151	20,128	
		Parbhudás Hirjí.	Kheda.	Mahmudábád	..	7	7	..	35	35	..	285	285	..	59	59	..	1,561	1,561	2.733	
				Mátar	..	7	7	..	41	41	..	327	327	..	56	56	..	1,513	1,513	2.398	
				Nariád	..	7	7	..	37	37	..	237	237	..	45	45	...	1,958	1,958	3,933	
				Kapatbanj	2	5	7	4	29	33	40	328	368	10	52	62	437	868	1,305	1,874	
				Thásrá	..	3	3	..	28	28	..	280	280	..	39	39	..	1,051	1,051	2.062	
				A'nand	..	11	11	..	43	43	..	317	317	..	53	53	..	1,912	1,912	2,691	
				Borsád	..	4	4	..	31	31	..	204	204	..	37	37	..	2,094	2,094	4,119	
				Native State. Cambay	..	6	6	..	12	12	...	83	82	..	22	22	..	684	684	1,855	
		1	1		2	50	52	4	256	260	40	2,010	2,050	10	363	373	437	11,641	12,078	21,665	
		Parbhurám Pránshankar.	Broach.	Broach	1	22	23	..	63	63	..	675	675	1	55	56	60	1,501	1,561	2.399	
				Jambusar	..	31	31	..	67	67	..	627	627	..	73	73	..	1,956	1,956	2,694	
				Amod	..	5	5	..	8	8	..	49	49	..	14	14	..	385	385	537	
				Wágrá	..	11	11	..	25	25	..	277	277	..	27	27	..	428	428	739	
				Ankleshwar	2	20	22	6	64	70	53	508	561	13	55	[illegible]	18	992	1,510	1.542	
		1	1		3	89	92	6	227	233	53	2,136	2,189	14	224	[illegible]	578	5,272	5,850	7,911	
		Jethálál Punjáji.	Súrat.	Chorási	1	8	9	5	25	30	47	333	380	4	31	[illegible]	543	799	947	4.547	
				Ulpád	2	3	5	9	20	29	81	243	324	15	72	[illegible]	420	1,040	1,460	1.209	
				Jaláipur	3	5	8	9	17	26	81	151	232	20	20	[illegible]	705	280	985	1.578	
				Balsád	..	8	8	..	35	35	..	318	318	..	45	[illegible]	..	978	978	1.478	
				Mándví	3	11	14	12	27	39	117	242	359	32	59	[illegible]	355	814	1,73[illegible]	1.571	
				Chicklí	1	6	7	4	13	17	43	131	174	10	14	[illegible]	151	333	514	1,718	

Name of Táluká.	Circle.	Superintendent.	Assistant Superintendent.	Collectorate.	Number of Encampments.			Number of Travelling Days.			Number of Miles travelled.			Number of Villages visited.			Number of vaccinated Children inspected.			Total Number of Children vaccinated during the year 1872-73.
					Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	
NORTHERN—*contd.*																				
MAHCHARIT, BERAR'MAT, COLA', M.D.—*contd.*																				
None.	Nath Kánthá Agency.	...	1	4	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Pálanpur Superintendency.	Státe—*contd.*	Jethalál Punjáji. *contd.*	1	1																
None.	Pálanpur ...	Bárdoli ...	...	...	4	13	17	12	40	52	92	370	462	33	59	92	1,619	1,560	3,179	2,152
	Disá ...	Párdi ...	...	...	2	15	17	...	48	48	...	560	560	...	65	65	...	1,276	1,276	1,423
	Dhánera ...	Náthre Státes. Dharmpur	...	...	2	5	5	20	20	20	...	119	119	...	15	15	...	555	555	2,189
	Kákhrej ...	Bánsdá ...	...	...	1	3	3	...	7	7	...	55	55	...	5	5	...	102	102	1,457
	Deodar ...		...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	412
	Tehurwádá ...		...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	202
	Wáw ...		...	...	1	...	1	1	...	1	12	...	12	2	...	2	102	...	102	585
	Tharád ...		...	...	1	...	1	1	...	1	18	...	18	2	...	2	181	...	181	1,343
	Sántalpur ...		...	...	2	...	2	8	...	8	117	...	117	21	...	21	532	...	532	567
	Morewádá ...		...	...	...	...	...	...	...	...	...	...	...	5	...	5	60	...	60	259
	Wárye ...		...	...	1	...	1	...	...	...	...	...	...	2	...	2	89	...	89	50
	Charchat ...		...	...	1	...	1	1	...	1	6	...	6	6	...	6	103	...	103	157
	Jaitán ...		...	...	...	...	...	9	...	9	114	...	114	10	...	10	203	...	203	...
	Bláhbar ...		...	...	...	...	...	...	...	...	...	...	...	4	...	4	71	...	71	214
	Sugám ...		...	...	1	...	1	...	...	...	...	...	...	2	...	2	81	...	81	505
	Rádhanpur ...		...	...	3	...	3	11	...	11	145	...	145	20	...	20	1,070	...	1,070	2,373
					19	...	19	56	...	56	726	...	726	158	...	158	4,938	...	4,938	13,057
None.	Wátrak Kánthá ...	...	...	2	1	3	7	3	10	32	31	63	14	6	20	366	44	410	723
	Rhevar ...	...	...	...	...	...	...	3	...	3	49	...	49	8	...	8	102	...	102	436
	Bávesí ...	...	...	1	...	1	4	...	4	4	64	...	64	12	...	12	596	...	596	825
	Katosan ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	741
	Náni Márwád ...	...	...	3	1	4	10	3	13	152	36	188	22	2	24	782	53	835	3,208
	Sábar Kánthá ...	...	...	2	2	4	6	6	12	76	64	140	10	9	19	411	310	721	963
				8	4	12	27	12	39	373	131	504	66	17	83	2,257	407	2,664	6,914
				54	296	340	166	931	1,097	2,050	9,270	11,320	414	1,258	1,672	13,640	32,806	46,446	88,997
		4	4																	

	Lachman.	Karáchi.	Karáchí	23	7	30	46	20	66	255	187	442	50	9	59	990	113	1,103	5,131
			Dádu	...	24	24	...	32	32	...	199	199	...	71	71	...	839	839	1,174
			Sihwán	1	39	40	2	57	59	60	441	501	...	77	77	...	665	665	1,042
			Mánjhándá	1	13	14	1	19	20	55	128	183	...	44	44	...	943	943	825
			Kotrí and Kohistán	24	4	28	48	11	59	433	64	497	42	12	54	1,306	155	1,461	761
			Táttá	10	70	80	31	98	129	270	805	1,075	61	91	152	795	896	1,691	1,279
			Mírpur Sácrá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	323
			Ghodábárí	...	11	11	...	17	17	...	115	115	...	39	39	...	361	361	906
			Shábábandar	...	5	5	...	9	9	...	71	71	...	8	8	...	205	205	683
			Játí	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	803
			Belá	...	11	11	...	10	10	...	89	89	...	50	50	...	485	485	869
			Mírpur Batorá	2	16	18	2	19	21	29	238	267	10	44	54	693	418	1,111	1,092
	1	1		61	200	261	130	292	422	1,102	2,337	3,439	163	445	608	3,784	5,080	8,864	14,888
	Hásá Mal.	Shikárpur.	Shikárpur	8	...	8	28	...	28	58	...	58	134	...	134	563	...	563	2,576
			Rohrí	...	4	4	...	30	30	...	80	80	...	36	36	...	414	414	1,537
			Saidpur	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
			Ghotkí	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,050
			Mírpur Mátelo	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,787
			Obáurá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,456
			Sakkhar	13	...	13	28	...	28	160	...	160	30	...	30	1,490	...	1,490	2,926
			Náushahrá Abrá	2	6	8	5	21	26	31	131	162	5	46	51	362	571	933	1,880
			Sujáwal	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	130
			Ratáderá	...	6	6	...	7	7	...	13	13	...	4	4	...	39	39	253
			Ládkháná	...	2	2	...	9	9	...	43	43	...	27	27	...	269	269	645
			Kambar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,695
			Nasirábád	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	9
			Labdaryá	...	4	4	...	7	7	...	40	40	...	23	23	...	292	292	1,638
			Tiger or Thurí	...	4	4	...	8	8	...	55	55	...	23	23	...	175	175	1,349
			Mehar	1	...	1	2	...	2	55	...	55	...	...	...	...	...	...	528
			Kakkar	1	5	6	1	6	7	65	29	94	...	22	22	...	157	157	1,624
	1	1		25	31	56	64	88	152	369	391	760	169	181	350	2,415	1,917	4,332	21,083
	Asú Mal.	Haidarábád.	Haidarábád	11	18	29	15	67	82	137	618	755	41	111	152	632	1,718	2,350	4,217
			Tándá	4	2	6	4	8	12	49	125	174	4	53	57	429	265	694	1,518
			Bága-ká-Tándá	...	2	2	...	8	8	...	92	92	...	40	40	...	436	436	2,001
			Baddin	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,891
			Digrí	2	6	8	3	14	17	40	163	203	2	21	23	135	439	574	1,892
			Alhar-ká Tándá	3	3	6	4	7	11	103	78	181	17	26	43	876	412	1,288	1,087
			Mírpur Khás	2	2	4	5	5	10	74	74	148	23	...	23	416	...	416	...
			Sháhdádpur	...	16	16	...	21	21	...	274	274	...	65	65	...	947	947	2,156
			Hálá	1	11	12	3	18	21	33	190	223	10	57	67	221	887	1,108	1,959
			Sákkrand	...	6	6	...	11	11	...	178	178	...	35	35	...	275	275	2,237
			Moiá	...	7	7	...	20	20	...	180	180	...	48	48	...	474	474	1,797
			Naushahrá Ferozá	...	4	4	...	15	15	...	124	124	...	49	49	...	638	638	1,535
			Khandiárá	...	4	4	...	15	15	...	147	147	...	51	51	...	616	616	1,838
	1	1		23	81	104	34	209	243	436	2,243	2,679	97	556	653	2,709	7,107	9,816	24,128
	...	Upper Sindh Frontier	Jacobábád	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,824
			Kasmar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	735
			Thúl	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	661
	...	...		...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	3,220

Circle.	Superintendent.	Assistant Superintendent.	Collectorate.	Táluká.	Number of Encampments.			Number of Travelling Days.			Number of Miles travelled.			Number of Villages visited.			Number of vaccinated Children inspected.			Total Number of Children vaccinated during the year 1872-73.
					Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	
SINDH—*contd.*	J. WILLIAMS, M.D., Assist. Surgeon—*contd.*	Mehar Chand.	Thár and Párkar.	Umarkot	9	34	43	10	52	62	160	197	357	28	52	80	813	783	1,596	2,251
				Cháchrá	8	46	54	8	47	55	249	607	856	59	73	132	1,443	1,823	3,266	2,587
				Nagar Párkar	5	7	12	8	18	26	144	230	374	32	28	60	834	704	1,538	921
				Díplá	2	2	4	3	3	6	59	59	118	14	..	14	169	..	169	888
				Kiprá	4	26	30	8	31	39	152	385	537	54	137	191	761	953	1,714	1,468
				Sángarh	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	909
				Mittí	6	17	23	6	20	26	99	280	379	19	39	58	962	1,089	2,051	1,575
	1	1			34	132	166	43	171	214	863	1,758	2,621	206	329	535	4,982	5,352	10,334	10,599
			Native state.	Khairpur	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,941
1	4	4			143	444	587	271	760	1,031	2,770	6,729	9,499	635	1,511	2,146	13,890	19,456	33,346	75,859
				Chúrá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Dhrángdrá	..	7	7	..	8	8	..	204	204	..	17	17	..	509	509	2,619
				Halwad	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Jinjiwádá	..	20	20	..	22	22	..	230	230	..	15	15	..	259	259	2,381
				Jasdan	2	9	11	5	12	17	50	111	161	12	8	20	614	236	850	3,012
				Limdí	..	2	2	..	7	7	..	84	84	..	8	8	..	120	120	2,108
				Lakhtar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Máliá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Mùlí	4	..	4	4	..	4	46	..	46	2	..	2	111	..	111	..
				Pátrí	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Saelá	7	9	16	8	9	17	108	72	180	17	2	19	857	32	889	2,332
				Sudámdá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Vitthalgarh	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Wákáner	..	23	23	..	24	24	..	188	188	..	37	37	..	720	720	1,527
				Wadwán	3	6	9	3	23	26	82	204	286	3	17	20	268	275	543	2,659
				Wanod	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
					16	76	92	20	105	125	286	1,093	1,379	34	104	138	1,850	2,151	4,001	16,638
				Dharol	..	..	..	..	..	..	..	..	..	..	1	..	1	72	..	72	2,287
				Dráphá	7	1	8	12	1	13	150	28	178	34	6	40	2,183	177	2,360	1,296
				Dhorájí	1	..	1	1	..	1	12	..	12	1	..	1	40	..	40	..

Ranchoddás	Western Division.	Gondal	6	16	22	13	36	49	196	319	515	23	28	51	1,913	850	2,703	2,243
		Upletá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Gadká	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Gaurídhar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Taiá Diwání	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Kotrá Sangání	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Morví	..	7	7	..	15	15	..	142	142	..	22	22	..	603	603	2,993
		Tankárá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	257
		Bhánwad	4	1	5	6	5	11	76	94	170	14	9	23	537	190	727	1,618
		Jodhpur	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Júdiá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Khambáliá	..	1	1	..	7	7	..	40	40	..	8	8	..	266	266	2,228
		Kondurná	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Nawánagar	5	3	8	12	6	18	151	44	195	25	7	32	1,824	113	1,937	2,800
		Pál	1	..	1	2	..	2	18	..	18	4	..	4	156	..	156	..
		Rájkot	7	7	14	16	15	31	194	390	584	27	59	86	1,795	888	2,683	4,433
		Wasávar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Porbandar	4	23	27	10	32	42	97	333	430	19	30	49	1,876	1,908	3,784	2,799
1	2		35	59	94	72	117	189	894	1,390	2,284	148	169	317	10,376	4,995	15,371	22,957
Kánoji Jayarám.	Southern Division.	Dídan	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Jafrábád	..	1	1	..	4	4	..	70	70	..	11	11	..	450	450	2,813
		Bántwá	1	1	2	1	4	5	24	72	96	3	12	15	302	662	964	2,505
		Barusrá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Ménikwádá	1	3	4	4	7	11	69	110	179	13	13	26	652	517	1,169	790
		Bilká	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Jaitpur	3	8	11	9	19	28	104	75	179	13	13	26	444	531	975	3,309
		Chorwád	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Junágarh	8	8	16	15	7	22	172	32	204	42	12	54	5,853	238	6,091	2,277
		Kutiéná	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Mangarul	5	3	8	8	7	15	84	116	200	14	7	21	508	78	586	2,126
		U'ná	..	1	1	..	3	3	..	81	81	..	22	22	..	530	530	2,144
		Pattan	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Viráwal	..	1	1	..	4	4	..	49	49	..	2	2	..	58	58	1,202
		Visáwadar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
			18	26	44	37	55	92	453	605	1,058	85	92	177	7,759	3,064	10,823	16,957
	Eastern Division.	Bháwanagar	..	..	..	..	4	4	..	16	16	..	7	7	..	179	179	2,005
		Botád	1	2	3	4	6	10	42	30	72	10	2	12	827	335	1,162	2,551
		Kundalá	..	2	2	..	4	4	..	36	36	..	8	8	..	440	440	2,523
		Líliá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Mowá	..	8	8	..	10	10	..	160	160	..	40	40	..	1,232	1,232	2,610
		Noganwadar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Umrálá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Shehor	3	5	8	10	15	25	104	103	207	19	11	30	1,300	559	1,859	2,130
		Talájá	..	13	13	..	28	28	..	263	263	..	55	55	..	1,056	1,056	2,399
		Láthi	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Dánthá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		U'nd Surveyá	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
		Pálitáná	..	11	11	..	15	15	..	119	119	..	24	24	..	623	623	2,443
		Wallá	2	12	14	5	24	29	49	237	286	13	12	25	1,624	2,600	4,224	2,355
1	2		6	58	64	19	106	125	195	964	1,159	42	159	201	3,751	7,024	10,775	19,016
1	2	4	75	219	294	148	383	531	1,828	4,052	5,880	309	524	833	29,736	17,284	40,970	75,863

Circle.	Superintendent.	Assistant Superintendent.	Collectorate.	Name of Táluká.	Number of Encampments.			Number of Travelling Days.			Number of Miles travelled.			Number of Villages visited.			Number of vaccinated Children inspected.			Total Number of Children vaccinated during the year 1872-73.
					Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	
Rewá Kánthá.	S. B. Halliday, Assistant Surgeon.	Jethálál Gaupatrám.	Panch Mahals.	Godhrá	2	8	10	12	25	37	121	129	250	16	39	55	595	503	1,098	1,505
				Dohad	1	4	5	...	20	20	12	123	135	1	36	37	105	738	843	1,706
				Kalol	1	3	4	1	17	18	7	135	142	1	43	44	112	755	867	1,474
				Jhálod	2	...	2	11	...	11	54	...	54	14	...	14	647	...	647	1,492
				Halol	1	8	9	3	19	22	23	149	172	4	78	82	82	821	903	773
					7	23	30	27	81	108	217	536	753	36	196	232	1,541	2,817	4,358	6,950
			Native States.	Lúnwádá	2	10	12	9	52	61	45	354	399	26	184	210	649	2,596	3,245	1,726
				Rájpípla	9	12	21	40	45	85	267	311	578	65	58	123	2,568	1,634	4,202	3,306
				Bár á	5	12	17	10	33	43	128	336	464	32	119	151	669	1,813	2,482	3,692
				Bálásinúr	1	4	5	6	29	35	22	150	172	6	70	76	264	838	1,102	728
				Chotá Udaipur	3	4	7	9	9	18	75	87	162	9	15	24	123	168	291	510
				Sunth and Kadáná	2	6	8	7	19	26	54	151	205	19	58	77	516	611	1,127	944
				Sankhedá Mewás	2	5	7	13	18	31	113	131	244	22	32	54	469	581	1,050	932
		1	1		24	53	77	94	205	299	704	1,520	2,224	179	536	715	5,258	8,241	13,499	11,838
	1	1	1		31	76	107	121	286	407	921	2,056	2,977	215	732	947	6,799	11,058	17,857	18,788
	7	25	27		505	3,189	3,694	1,062	5,957	7,019	11,661	53,342	65,003	2,139	9,083	11,222	78,359	197,371	275,730	513,184*

* Excluding the Presidency, Barodá and Kutch Circles, the Superintendents of which are not peregrinating officers.

GENERAL DEPARTMENT.

No. 3998.

Bombay Castle, 25th November 1873.

Letter from the Surgeon General, Indian Medical Department, No. 3091, dated the 4th October 1873—Forwarding, with his remarks and observations, the annual report of the Vaccination Department for the year 1872-73.

Letter from the Superintendent General of Vaccination, No. 1056, dated 10th November 1873.

RESOLUTION.—This is the first year in which the changes in the Vaccination Department introduced in 1871-72 have been operative throughout the whole year, and Government concur with the Surgeon General in considering that the results are satisfactory.

2. The following is the number of persons in civil life vaccinated in 1872-73 as compared with the previous year :—

	1871-72.	1872-73.
Primary	5,21,521	5,63,526
Re-vaccinations	19,196	16,301
	5,40,717	5,79,827

The increase therefore is 39,110. The figures for the army are 8,401 and 8,530 respectively, giving an increase in favor of the year just past of 129.

3. The establishment consisted of the Superintendent General, 10 Superintendents, 27 Assistant Superintendents, 12 Clerks, 373 Vaccinators, and 406 peons. The total cost was Rs. 2,10,795. Each Vaccinator performed on an average 1,506 operations, which is a trifle below the average in 1870-71, when all the Vaccinators were skilled hands, and 95 above the average in 1871-72, when many were new to the work.

4. The cost of each operation was 6 annas and 8 pies, or 7 pies more than in the preceding year. This is not quite satisfactory, as in 1871-72 there was also an increase of 1 pie. Government trust that the efficiency of the reorganized establishment will be shewn in the current year by the cost of the operation becoming cheaper.

5. The number of infants vaccinated under one year of age was 1,98,484 being the largest number as yet attained to. With the aid of the Birth-registers which are kept in each village, the infants passed over by the Vaccinators should be very few in future.

6. Of persons in civil life primarily vaccinated 2,98,314 were males and 2,65,212 females : Christians numbered 3,069, Hindoos 4,29,001, Musalmans 95,339, Parsees 1,693, while 34,424 are classed as Miscellaneous. Total 5,63,526, or 2·81 per cent. of the whole estimated population. There were also 16,301 re-vaccinations.

7. The percentage of success in primary vaccinations was 94·6 and in re-vaccinations 66·9.

8. Notwithstanding the increased strength of the Department which enabled a Vaccinator to be appointed to each Talooka, the number of operations has fallen off in Sind as well as in Rewa Kanta and Kutch. This is to be regretted. Government especially notice with displeasure the bad accounts of the Southern Circle. Not only is the percentage of the population operated on far behind the rest, but the average number of operations performed by the Vaccinators is the lowest. The percentage of success ascertained by the Superintendent is also nearly 20 per cent. behind any other Circle. The removal of the two incompetent Assistant Superintendents (who ought never apparently to have been appointed) will, it is hoped, somewhat mend matters; but if it be really the case that nearly one-half of the Vaccinators themselves are indolent, an example will have to be made of some of them.

9. The results of the year's operations seem best in the Northern, Central, and Kattywar Circles, under the Superintendents Messrs. Robb, Colah, and Butler. Mr. Cody seems also to have done good service.

10. The greatly increased average of work done by Municipal Vaccinators which was brought to notice in last year's report has been well maintained in 1872-73; the average being 1,129 operations per man. This is much below the general average of the Department, but considering the difficulties the Vaccinators have to contend with in large towns where the field of operations is also limited, it may be considered good.

11. The attention of the Collector of Poona should be drawn to the remarks contained in paragraph 27 of the report. It would be well if he could succeed in obtaining an increase to

the pay of the new Vaccinator who has been appointed to do work in Narayangaon and Otoor.

12. Government view with much pleasure the progress vaccination is making in Native States. The prompt assistance given by the Chiefs of Jamkhandi, Sanglee, and Miraj is greatly to their credit. The attention of the Karbhari of Bhore should be drawn to the advisability of appointing another Vaccinator to that State. The suggestions of Dr. Turnbull for the re-organization of the Vaccination Department in Kutch should also be communicated to the Political Agent. It is probable that His Highness the Rao would readily entertain Dr. Turnbull's sensible proposals if they were laid before him.

13. Dr. Turnbull reports that for want of skill, coupled with want of energy and deficient tact, the vaccination that goes on at Dispensaries is very unsatisfactory. Government were certainly not prepared to learn that many Sub-Assistant Surgeons and Hospital Assistants are unable to vaccinate, and they cannot imagine how, with such ignorance, they can have passed into the service. The Surgeon-General should be requested to make arrangements so that all the students at the Grant Medical College may learn vaccination in future. At the same time His Excellency in Council is not altogether prepared to endorse all Dr. Turnbull's conclusions as to Dispensary Vaccination. The officers in charge of these institutions have more important duties to perform than vaccination, which is merely an incidental adjunct to their appointments. They are moreover placed in large towns where, as Dr. Turnbull himself admits, the population is usually more obstructive than in rural districts, and not having undivided time, are unable to go seeking for children as the regular Vaccinators can. In future, where there is a Municipal Vaccinator he should be responsible for the vaccination of the town. Where there is none, the officer in charge of a Dispensary should be looked to, but the Superintendent General must try to have a special peon allowed him for the purpose, or he cannot be expected to work satisfactorily.

14. The Deputy Surgeons-General should take care to notice in their reports the progress made in vaccination at each Dispensary, and any cases of incompetence should be specially reported.

15. Government have already expressed their views on the subject of animal vaccination. It is a subject to which the most careful attention should be paid.

16. It was to be expected that a few isolated cases of inoculation would be discovered. There is no fear, however, of its spreading, and Government do not think that it is an offence that should be heavily punished. It is to be remembered that after all those who practise it are only a little behind the age.

17. Dr. Turnbull has given statistics of deaths from small-pox only for the town and island of Bombay. These amounted to 1,637. The figures for the rest of the Presidency should have been obtained from the Sanitary Commissioner. It appears from that officer's report that in the calendar year 1872, including Bombay, the deaths from this disease were 26,699 in number, being 17,296 more than in 1871. This is much to be regretted, but shows what a number of valuable lives may in future be saved by vaccination.

18. The Revenue and Political officers gave, as was to be expected, all the aid in their power to the Vaccinators. An instance to the contrary is quoted by Mr. Robb, but the ill success of the Vaccinator seems from Mr. Robb's own account to have been more due to the weakness of the man himself than to any dereliction on the part of the officials.

19. Government quite concur with Dr. Turnbull that no hard and fast line can be drawn to regulate the number of villages to be gone through by a Vaccinator in a year, but it is certainly advisable that as many villages should be visited as possible.

20. The Assistant Superintendents seem on the whole to have been a success, and to judge from the present report their creation has been justified by the results. The improved correctness of the returns, which Government are glad to hear of, is no doubt to be attributed in some measure to them.

21. The different Superintendents have, to judge from their reports and Dr. Turnbull's commendations, generally exhibited praiseworthy energy, which has been shared in by their subordinates. Government must, however, repeat their opinion that officers who have so much district work as Superintendents of Vaccination ought certainly to know the vernacular. Attention was called to this in the review of the last year's report, but apparently with no effect. The Surgeon-General should be asked his opinion as to the advisability of making the passing of an examination by the Superintendents compulsory, since, without such knowledge,

they cannot examine the vaccination returns for themselves or speak directly to the people.

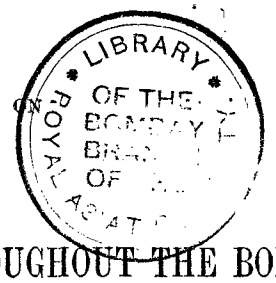
22. In conclusion, Government are glad to record their sense of the zeal and intelligence exhibited by Dr. Turnbull while he has been in charge of the Department.

F. S. CHAPMAN,
Chief Secretary to Government.

To

The Surgeon-General, Indian Medical Department,
The Commissioner in Sind.
The Revenue Commissioner, N. D.,
The Revenue Commissioner, S. D.,
All Collectors, including Sind, and the Assistant Collector in charge Panch Mahals,
The Military Department of the Secretariat,
The Political Department of the Secretariat,
The Sanitary Commissioner,
The Municipal Commissioner for the City of Bombay,
J. M. Campbell, Esq., Compiler, Administration Report for 1872-73 (with a copy of the report).

REPORT



VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SIND

FOR THE YEAR 1873-74.

Bombay:

PRINTED AT THE GOVERNMENT CENTRAL PRESS.

1874.

133476

No. 2085 of 1874.

From

The SURGEON GENERAL,

Indian Medical Department,

To

The SECRETARY to GOVERNMENT.

Bombay, 9*th July* 1874.

Sir,

I have the honour to forward the Annual Report on Vaccination for the year 1873-74, in which there are many points of interest.

2. The total number of persons operated on was 652,223, which is 63,866 over the preceding year ; the most marked increase being in the itinerant establishment, which accounts for 61,684 of the total increase. The dispensaries show an increase of 1,358, and the army of 824.

3. This large increase in the numbers vaccinated and re-vaccinated shows probably not only greater exertion on the part of the Superintendents and their subordinates, but also increased appreciation on the part of the people, evidenced by greater willingness on their part to submit their children to the operation ; but the largest factor is undoubtedly the increase in the number of vaccinators and the constant supervision over them exercised by the Assistant Superintendents. This has resulted from the reorganization of 1871.

4. Where progress has not been so great, the Superintendent General attributes the want to the vaccinators being too few in number for the population and area.

5. It is gratifying to know that among so many vaccinators, in only one instance was a register found incorrect ; and even this may be attributed to carelessness on the part of the vaccinator, rather than to an attempt to falsify the record, as it extended to only 6 names altogether. I may here add that the conduct of the vaccinators in general has been satisfactory.

6. The percentage actually verified by Superintendents comes so near to the numbers given by the vaccinators that, in my opinion, the latter may be accepted as correct, and these show a good amount of successful work done.

7. The disparity between the sexes, which was formerly so great, has, by more careful registration, been reduced; and last year the males were 52·8 to 47·2 females in each 100, being a difference of 5·6, whereas in 1866 this amounted to 10.

8. The percentages of caste are much the same as for several years back.

9. There was an increase in the number of infantile vaccinations of 37,059, which is more than half the total increase; the percentage of children under one year in the total vaccinated is 38, or 1·2 higher than in the preceding year. Dr. Pinkerton thinks that probably 41 or 42 per cent. of infantile vaccinations is about the highest that can be reached by an itinerant establishment, such as ours is. In this view I concur. But where large populations are stationary, as in Bombay City, a much higher ratio can be obtained—thus in Bombay City last year the rate was 65·3 per cent. I regret to observe that the Southern Circle returns show only 25 per cent. of infantile vaccinations, or 13 per cent. less than the average for the whole Presidency. I recognize the general improvement which has taken place last year in the Southern Circle, and trust that Surgeon Raby will, in his next report, be able to show in this particular, as well as in general, more favourable results. All thorough vaccination must aim at protecting infant life, because infants suffer most, both actually and relatively, from small-pox when unprotected.

10. The success in primary vaccinations was 94·8, which is only a little higher than in the preceding year (0·2). It was highest in Sindh, and lowest in the Presidency and Southern Circles. In re-vaccinations it was 65·7 in the general returns; but in the army returns it was 48·2, which the Superintendent General thinks more likely to be corrrct. Dr. Pinkerton notices the difficulty in the way of attaining uniformity in noting the results of re-vaccination, and he states, "it is difficult to fix an arbitrary standard of success in re-vaccination, and most medical men even record differently: thus one will register a success, even though the vaccine vesicle has run its course to a pustule in five days; another considers that all the typical manifestations must be observed."

11. The lymph in all the Circles was good and abundant, except in the Presidency Circle, where during July and August the animal lymph failed. Dr. Cola remarks on the tendency of the lymph to degenerate in Gujarath during the rainy season, but the Superintendent General believes that carefully selected vesicles and children, with carefully performed operations, are quite equal to meet and obviate this. The tendency to degeneration is probably greatest in the hot season everywhere; but even then, there is no difficulty in carrying on vaccination, as the work in Sind and the Presidency Circles, which have the extremes of heat and moisture,

proves. Last year the lymph supplied from England was not so successful as usual and no reason can be given for it. The Secretary of State might be requested to communicate the source of each supply sent out.

12. Animal vaccination is still carried on, and is very much esteemed in Bombay; and though the percentage of success is not so high as when human lymph is used, still it must always be viewed as a valuable adjunct; as here, few persons allow lymph to be taken from the vesicles on their children, and some parents prefer the animal to human lymph.

13. Although there has been an increase in the total expenditure of the department, the cost of each successful vaccination has been less by 6 pies than in the preceding year.

14. The progress of vaccination is satisfactory in all Government districts, except Belgaum and Dharwad. A further extension would follow an increase in the number of vaccinators there, and the Superintendent General wishes the attention of the Collectors called to the advisability of having more than one taluka vaccinator where the population exceeds 100,000. In Native States, the progress has been satisfactory, and promises further improvement. Although vaccination at dispensaries may not be all that can be desired, still some progress has been made and more will gradually follow. I am glad to observe that several of the officers in charge of dispensaries have been favourably noticed by Dr. Pinkerton, especially Assistant Surgeon Mackenzie and Honorary Surgeon Sinclair.

15. The Superintendent General views with anxiety and foreboding of ill the falling off in the numbers vaccinated in Bombay, and he is of opinion this can be met only by a compulsory Vaccination Act. Certainly the results are altogether disproportionate to the cost. The reason of this is evidently due chiefly to there being a Superintendent to so small a circle as Bombay Presidency Circle is, his pay alone adding about 7 annas to the cost of each successful case. Speaking generally, it is difficult for a vaccinator in a city to vaccinate as many as he can do in a rural district.

16. As regards inoculation, Dr. Turnbull notices that it had been practised in the Wái Táluká, but the Superintendent General is unable to say to what extent. It is evident there could have been very little of it.

17. The Superintendent General thinks no reliance can be placed on the record of deaths from small-pox for statistical purposes.

18. Dr. Pinkerton estimates the population at 24½ millions, which includes the civil population of Mhow, Nimach, and Nasirabad, and he thinks there are at least 735,000 births per annum. After writing off $\frac{1}{3}$th of the births for deaths, &c., he considers the depart-

ment might vaccinate 678,462 children primarily, or probably even more, according to the annual increment of population. He takes the birth-rate at 30 per mille, which, in my opinion, is a low rate. On this basis $\frac{9}{10}$ths of the available children were vaccinated last year. This very satisfactory result is attributed to the re-organization of 1871.

19. The average number of persons vaccinated by each vaccinator for the whole Presidency is 1,652, or 146 more than the preceding year. It was highest in Sindh and lowest in the Presidency and Southern Circles.

20. In the last 4 or 5 years, in at least a million of observations, there has not been a single instance brought to light of syphilis having been communicated by vaccination; nor has ever any such occurrence been known in the Bombay Presidency.

21. The suggestion of the Superintendent General of Vaccination, that Government might avail itself of the services of the Medical Officers of the Vaccination Department in the general sanitation of the country, might be made of great value. I would rather agree with the Superintendent General in maintaining the present number of Superintendents and allowing them to be Sanitary Officers for their own districts, believing as I do they must thus become a power for great good in the furtherance of this cause so greatly to be desired. These officers, with their assistants, so constantly moving about in the districts and visiting thousands of villages, might certainly be, as the Army Sanitary Commission suggested, made useful for efficient inspecting service in helping towards the removal of local disease causes. The Bombay Vaccination Department partakes very much indeed of the character of what might be a most efficient sanitary service for the Presidency; and it appears to me that the Sanitary and Vaccination Department working together might, in a very short time, collect a fund of useful information, which would go far towards enabling this Government to take active sanitary steps when they may be able to do so.

22. Government will be glad to know that the Assistant Superintendents have "completely realized the expectations formed of them," and may be disposed to extend their usefulness in the matter of sanitation so strongly advocated by the Army Sanitary Commission, as the Superintendent General reports this might be done without injuring their efficiency in their own branch, or adding much, if any, to the expenditure.

23. A new feature in this report is the carefully prepared details regarding the progress of vaccination in each zilha, which give the important points of the tabulated statements, and enables the general reader easily to apprehend the state and condition of vac-

cination in every part of this Presidency. These details show that the progress varies very much in different districts and circles. Thus in Sindh 42·1 per mille of population were primarily vaccinated, while only 13·4 in the Presidency Circle, and 17·2 in the Southern Circle, were protected during the past year.

24. Considering the amount and the quality of the work shown in this report, I most cordially endorse the words of the Superintendent General regarding how much more it says in favour of the organization of the department, and for the energy of the Superintendents, their assistants and vaccinators, than words can do; and I beg to add, I am entirely satisfied with the work of the past year, and to commend the Superintendent General and Doctors Williams, Butler, Cody and Cola to the favourable notice of Government.

I have the honour to be,
Sir,
Your most obedient Servant,

(Signed) W. THOM,
Surgeon General,
Indian Medical Department.

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SINDH

FOR THE YEAR 1873-74.

This is the sixth report by the Superintendent General of Vaccination. It is divided into the usual parts, viz., 1st the general report, which is a summary of the work of the whole department, and in it the chief points of the circle superintendents' reports are noticed; 2nd, extracts from the reports of superintendents, civil surgeons and dispensary officers and also several special reports on revaccination; and 3rd, the tables of returns showing the number of vaccinations in each circle; the cost of vaccination in each circle and for the whole department: the vaccinations at dispensaries, jails and in the army: also the number of vaccinated children inspected by superintendents and their assistants and the number of small-pox deaths in each registration circle.

Divisions of the report.

2. Before proceeding to show the work of the year it will be well to notice the changes which have taken place in the circles since last report was submitted. In the reorganization of the department which was made in 1871 there was a saving of some ten thousand rupees, which Government in their Resolution No. 1202 dated 3rd April 1873 ordered to be expended in improving the department, because they had pledged themselves not to effect a saving of provincial money at the expense of local funds. Accordingly, Dr. Turnbull when acting Superintendent General, drew up a scheme which was submitted to Government in his letter No. 378 dated 3rd June 1873 and finally approved by Government Resolution No. 2783 dated 7th August 1873, and brought into effect from the following November. The changes may briefly be expressed thus:—

Alterations in the vaccine circles.

1st, the Rewá Kánthá circle was abolished and its districts thrown into the Northern circle, which then became the Eastern Gujaráth circle; 2nd, the Ahmadábád collectorate and Pálanpur states were taken from the Northern circle and thrown into the Káthewád circle, which then became the Western Gujaráth circle. This new distribution of districts divides Gujaráth, as it was in 1854, with the exceptions, that the Mahí Kánthá is now in the Eastern Gujaráth circle instead of the Western Gujaráth circle and Baroda territory does not form a part of Western Gujaráth circle as it did in 1854 but is now a separate circle by itself; 3rd, Násik and Khándesh collectorates and Penth state were taken from the Central circle and added to the Western circle; 4th, Ratnágirí collectorate was taken from the Western circle

1 *ra*.

and added to the Central circle ; and 5th, Sáwantwadi state was taken from the Western circle and thrown into the Southern circle ; 6th, it was recommended that, after Dr. Butler vacates his dual appointment of civil surgeon of Rájkot and superintendent of vaccination, in the Western Gujaráth circle, the two appointments should be separated, and that there should be a superintendent for the Western Gujaráth circle, who shall have no other than vaccine duties to perform—as yet the Government of India's sanction to this part of the scheme has not been received ; 7th, an additional assistant superintendent in each of the large zilhás of Sátárá, Khándesh, Násik, and two additional for the Province of Sindh were sanctioned ; 8th, a second clerk in the office of the Western, Eastern Gujaráth, Western Gujaráth and Sindh circles, and a third peon in each superintendent's office, were also sanctioned. These changes will exhaust the saving effected by my reorganization of 1871—provided the Government of India sanction a superintendent for the Western Gujaráth circle, who shall not be the civil surgeon of Rájkot.

Circles as they now stand.

3. There are now 9 circles of vaccination, viz :—

1*st*. The Presidency circle which is the city and island of Bombay.

2*nd*. The Central circle which comprises the collectorates of Púná, Ahmadnagar, Sholápur, Sátárá and Ratnágirí ; the native states of Akalkot, Bhor, Jat, A'tpadí and Phaltan.

3*rd* The Southern circle which includes the collectorates of Belgáon, Dhárwád, Kánadá and Kaládgi ; the native states of the Southern Maráthá country, Kolhápur and Sáwantwádí.

4*th*. The Western circle, which contains the collectorates of Tháná, Kolábá, Násik and Khándesh ; the native states of Penth, Jawár and Janjírá : the 6 Mowas and 15 Dang states and also the estates of 5 political Surinjamdars in Khandesh.

5*th*. The Eastern Gujaráth circle, which comprehends the collectorates of Surat, Broach, Khedá and the district of Panch Mahál ; the native states of Rewá Kánthá, Mahí Kánthá, Cambay, Bánsdá, Dharampur and Sachin.

6*th* The Western Gujaráth circle, which consists of the collectorate of Ahmadábád, the province of Káthewád and the Pálanpur states.

7*th*. The Sindh circle, which comprises the collectorates of Karáchí, Haidrábád, Shikárpur, the political superintendencies of Thar Párkar and Upper Sindh Frontier and the native state of Khairpur.

8*th*. The Barodá circle, which is the territory of H. H. the Gáíkawád.

9*th*. The Kutch circle, which is the territory of H. H. the Ráo.

Strength of the department.

4. The strength of the department at the end of the year is compared, below, with the preceding year and the areas and populations of circles are also shown.

Number.	CIRCLES.	Area in square miles.	Population.	1873-74.																	1872-73.														
				Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Number of Vaccinators.						Number of Peons.						Total Strength.	Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Number of Vaccinators.						Number of Peons.						Total Strength.
								Government.		Municipal.	Local Funds.	Native States.	Total.	Government.	Municipal.	Local Funds.	Native States.	Total						Government.		Municipal.	Local Funds.	Natives States.	Total.	Government.	Municipal.	Local Funds.	Native States.	Total.	
								Civil.	Military.																Civil.	Military.										
1	Presidency	19	644,405	1	1	...	2	...	...	11	...	...	11	4	11	...	...	15	30	1	1	..	2	..	..	11	..	..	11	4	11	..	..	15	30
2	Central	27,656	4,828,856	...	1	5	2	...	...	12	48	5	65	9	11	48	5	73	146	..	1	5	2	...	...	14	48	5	67	8	13	48	5	74	149
3	Southern	28,104	4,757,127	...	1	5	2	...	...	6	37	25	68	8	3	37	25	73	149	...	1	5	2	..	..	7	36	22	65	7	3	36	20	66	139
4	Western	24,519	3,070,259	...	1	5	2	...	...	4	42	3	49	9	3	42	1	55	112	...	1	4	1	...	..	4	42	3	49	7	3	42	1	53	108
5	Eastern Gujaráth	25,774	3,112,490	...	1	4	2	...	...	3	25	18	46	8	3	25	15	51	104	...	2	4	2	...	..	3	25	18	46	10	3	25	13	51	105
6	Western Gujaráth	30,246	3,142,153	...	1	3	2	2	...	5	7	38	52	9	5	7	38	59	117	...	1	3	1	2	..	5	7	38	52	8	5	7	38	58	115
7	Sindh	52,978	2,300,711	...	1	6	2	...	...	5	43	2	50	10	3	43	2	58	117	...	1	4	1	..	..	5	43	1	49	7	3	43	1	54	109
8	Barodá	*20,000	2,000,225	...	1	1	1	...	...	...	...	23	23	...	...	...	25	25	51	..	1	1	1	...	..	..	...	23	23	..	..	...	25	25	51
9	Kutch	6,500	486,900	...	1	1	...	...	...	...	...	11	11	...	...	...	9	9	22	..	1	1	...	..	...	..	..	9	9	..	..	...	4	4	15
	Aden	12	19,289	...	...	...	...	...	...	2	...	...	2	...	2	...	...	2	4	..	...	...	..	..	..	2	..	...	2	..	1	..	..	1	3
	Military Stations	...	123,220	...	...	...	...	...	4	...	...	...	4	...	...	...	...	...	4	...	..	...	...	...	4	..	..	...	4	..	...	..	...	...	4
	Total	215,808	24,485,629	1	9	30	15	2	4	48	202	125	381	57	41	202	120	420	856	1	10	27	12	2	4	51	201	119	377	51	42	201	107	401	828

* This is a rough estimate.

There are only six vaccinators in this Presidency paid by Government; they are 2 (civil) for Rájkot and Dísá and 4 (military) for the cantonments of Púná, Mhow, Nímach and Nasirábád: all the others are paid from local funds, municipal funds and native states. From the above table it will be seen that there are 6 government, 48 municipal, 202 local funds' and 125 native states' vaccinators: total 381. There are 420 peons. Nearly all vaccinators have a peon, each assistant superintendent has one, each superintendent has 4 and so also has the Superintendent General 4. There are, as compared with 1872-73, exactly the same number of government vaccinators, 1 more local fund vaccinator, but 3 fewer municipal and 6 more native states: on the whole there is an increase of 4. At the end of the official year the Presidency circle establishment of municipal vaccinators was increased by 5 at the cost of 6 peons who were reduced; so there are now in Bombay city 16 vaccinators and 5 peons. Just about the close of the year a municipal vaccinator was appointed for Dhárwád and one is to be appointed for Kárwár and another for Gulatgad. The municipal vaccinators for Bárámati and Khánápur were abolished in July and November and the Wálwá and Karhád municipal vaccinators were abolished at the end of the year. The increase of vacccinators in native states is owing to the Chief of Sánglí appointing a vaccinator in each of his districts of Shirhattí and Mangalvedhá. The Chief of Miraj appointed a second vaccinator for Lakshameshwar. H. H. Mír Alí Murád has appointed a second vaccinator and in Kutch there was an increase of two.

Total number of persons vaccinated and revaccinated.

5. The number of persons vaccinated last year is more, in nearly all circles than in the year preceding, but the rate of increase differs a good deal in the different circles, which I shall notice further on.

The following figures show the number of persons who were vaccinated and revaccinated in the year 1873-74 and the preceding one:—

1873-74.			1872-73.	
Primary Vaccinations.	Revaccinations.	In Civil Life.	Primary Vaccinations.	Revaccinations.
600,471	22,409	Itinerant Establishment	546,566	14,630
18,560	1,429	Dispensary Establishment	16,960	1,671
619,031	23,838		563,526	16,301
642,869		Civil Life Total	579,827	
9,354		Army Total	8,530	
652,223		Total Vaccinations in Bombay Presidency	588,357	

There is thus an increase, as compared with the preceding year, of 63,866 persons operated on. This increase is the largest that has ever been made in any one year and it is distributed as follows :—

Itinerant establishment	61,684
Dispensary do.	1,358
Army do.	824
Total increase.....	63,866

I may at once say, there can be no doubt but that the increase is mainly due to the reorganization of 1871 having increased the nnmber of vaccinators and given to the department a most useful class of men, viz., the assistant superintendents, who constantly see that the vaccinators do their duty well.

Excess of operations over the number of persons primarily vaccinated.

6. There were 7,733 operations more than the number of persons primarily vaccinated : that is to say, the vaccine operation was performed that number of times on persons who had been unsuccessfully operated on at least once before.

Sex, caste, age and result.

7. The particulars as to sex, caste, and age are not recorded in revaccination cases nor in secondary operations; there is thus the exact number of persons primarily vaccinated shown in the columns for sex, caste, and age under the heading of primary vaccination; but in the columns for result, both under primary vaccinations and revaccinations, secondary operations are entered, thus there are more operations than there are persons: this excess of operations is shown in a foot-note to the Statements No. I. and V. and also for the native troops in No. VI.; but I am unable to give a similar foot-note for British troops, as I get a return which only shows the successful cases; and for it I am indebted to the courtesy of Surgeon-Major Codrington, Secretary to the Surgeon-General, Bombay Command.

Percentage of sex.

8. There were, exclusive of the European army returns, 329,865 males and 294,831 females primarily vaccinated. The proportion of the sexes in every hundred persons is therefore 52·8 and 47·2 respectively. The disparity is greatest in Bombay city where the males are 55 per cent. and it is lowest in the Western circle where they are 50·3. There has been a gradual decline in the excess of males over females during the past six years, with the exception of 1871-72. In 1866 the males exceeded females by 10 in every 100 persons, last year they exceeded by 5·6. This decrease in the disparity of the sexes is due to the superintendents and their assistants impressing on the vaccinators that errors in respect to the sexes will be punished as severly as any other errors arising from carelessness.

Castes.

9. As regards castes, exclusive of the European and native armies' returns, and taking the figures in Statements No. I. and V., there were christians 3,281, hindús 454,915, musalmáns 114,745, pársis 1,216, and other castes 44,874, or percentages of ·53, 73·49, 18·53, ·19 and 7·25 respectively. I am unable to say whether these percentages bear any close relation to the number of each caste in the general population, but there has not been much difference in these percentages for several years back.

Age.

10. There has been a considerable annual increase in the number of infantile vaccinations during the past six years with the exception of 1870-71, but the percentage has rather fallen; the following figures are for six years in civil life, viz. :—

Years.	Infantile vaccinations.	Percentages.
1868	177,276	41·1
1869-70	191,221	41·8
1870-71	157,671	36·3
1871-72	174,522	34·5
1872-73	198,484	36·8
1873-74	235,543	38·0

Although there has been a very great increase in the number of infantile vaccinations since 1868, still it is evident that there has been a greater among children above one year old. This is doubtless due to the vaccinators endeavouring to leave as few unprotected behind them as possible. In a population of twenty-four and a half millions, it is probable that there are 678,462 children annually available for vaccination ; but it takes the vaccinator, on an average, about two years to go over his charge, so that this reduces the infantile children to half the above sum : and again, in many parts of this presidency mothers strongly object to have children vaccinated under six months old, so that, in point of fact, it is really all but impossible to vaccinate within a year of birth, much more than a third of the available children. I think if we can reach 41 or 42 per cent. it will be doing very well. In Bombay city the percentage of infantile vaccination is as high as 65·3 and in Eastern Gujaráth circle it is 44·5, whereas in the Southern circle it is only 25·0 : which is a very strong indication that more vaccinators are required there.

Percentage of success.

11. The percentage of success is, exclusive of the British army return, 94·8 in primary vaccine operations and 65·7 in revaccinations. The success in primary vaccinations is 0·2 higher than last year, but it is not as high as it ought to be. If vaccinators would vaccinate always from arm-to-arm and with good lymph the success ought to be 99 per cent. ; but unfortunately they cannot always get a child, to go from one village to another, with vesicles on the arms, and so they are often obliged to start work in villages from tube or glass-lymph, and as a matter of course there are always many of the first series unsuccessful. This matters all the more, that many parents object to a second operation after failure, though they willingly submitted their children to the first operation. The percentage of success in revaccinations, I consider, is too high. It is difficult to fix an arbitrary standard of success in revaccinations, and most medical men even record differently ; thus one will register a success even though the vaccine vesicle has run its course to a pustule in 5 days ; another considers that all the typical manifestations must be observed. I cannot believe that 65·7 per cent. of the revaccinations ran a perfect course, though there may have been more or less success in that number. The percentage of success varies a good deal in the different establishments as shown below :—

			Primary Vaccinations.	Revaccinations.
1*st.*	2	Government vaccinators obtained	92·4	42·8
2*nd.*	48	Municipal do. do.	92·9	64·0
3*rd.*	202	Local fund do. do.	95·2	73·6
4*th.*	125	Native States do. do.	95·0	70·1
5*th.*		In Dispensary returns	91·5	63·1
6*th.*		In Native Army	90·9	48·2

The local fund vaccinators again stand highest and the native states are close on them. The success in dispensaries is low and it is still lower in the native army. This is a matter of surprise to me; but I cannot explain it, unless it be produced by there being few comparatively to vaccinate and so good lymph cannot always be maintained in regiments. The following figures show the success in Statement No. 1, by circles. It will be observed that the success is highest in the Sindh circle in primary vaccination and lowest in the Presidency and Southern circles—Aden and dispensaries excluded :—

	Primary Vaccination.		Revaccination.	
1. Presidency Circle	87·9		53·5	
2. Central do	95·8		63·0	
3. Southern do	92·9		61·0	
4. Western do	93·7		67·5	
5. Eastern Gujaráth Circle	94·8	Average 94·9.	65·9	Average 68·2.
6. Western Gujaráth do	95·6		66·4	
7. Sindh Circle	97·5		77·1	
8. Barodá do	93·5		86·4	
9. Kutch do	93·9		57·1	
Aden	80·0		60·4	
Dispensaries	91·5		63·1	

The method of calculating the percentage is liable to the objection that one person may reckon as two unsuccessful cases—for instance in Statement No. 1. there are 28,678 unsuccessful operations recorded, and of these 7,171 were operations on persons who had been at least once unsuccessful, but I cannot say how many of these 7,171 were twice unsuccessful, or how many of them were successful on the second operation. Our method of reckoning the percentage of success is that, the total of operations (not persons) is taken, and from it the number of operations whose result is "unknown" is deducted, and the remainder is then considered the total on which the percentage of success is calculated. For all practical purposes this is a good enough method, but it is not absolutely correct. Exclusive of the British army but including the native army returns there were 567,153 successful primary operations, 30,724 unsuccessful, and in 34,552 the result was unknown—of the unsuccessful only 7,733 were operated on more than once. It is certainly to be regretted that so few of the unsuccessful are vaccinated a second time: but there is some reason to believe that many of the unsuccessful operations occur in people who have had mild small-pox or been more or less successfully vaccinated previously. Surgeon Cody makes some remarks on this subject in his report. He says, "I think a good deal of this low rate is to be attributed to the failures which occur amongst persons who ought rather to appear in the revaccination columns than in the primary, &c."—*vide* para. 7, page 27.

Quality of lymph.

12. The lymph in use throughout the whole year has been reported on by all the superintendents of circles as good. There have been a few exceptions to this general rule particularly in the Eastern Gujaráth circle, where Dr. Colá says the lymph deteriorates in the rains, and he appears to think it does so on

account of the season. Now, this opinion is too general to be of much value; we certainly have more rain in the island of Bombay and the Konkan generally than in any part of the Eastern Gujaráth circle, though perhaps the heat there may be a little greater. During the hottest months there is a tendency to degeneration of the vaccine virus, but this can be easily met and prevented by 1st a little extra care in selecting the very best and most typical vesicles from which to take lymph : 2nd vaccinating very carefully from arm-to-arm and 3rd selecting healthy and clean-skinned children to operate on. When I was superintendent in Sindh, I have seen many children, with the most perfect vesicles, when the hot wind was blowing in May and the thermometer at 110° in the shade. Even tube-lymph, if carefully selected and sealed, succeeds very fairly in the month of July—as was proved last year by two experiments. Dr Gordon in medical charge of the Puná Horse at Sirúr charged 17 tubes in June 1873 : of which 9 were sent to the Southern circle and 8 to the Central circle. Dr. Raby reported the result of the use of the 9 as follows, viz :—

10 children were operated on and 61 punctures made : vesicles appeared on all the children except one, and 42 insertions resulted in vesicles, of which 30 were characterized as large and well-shaped, very good, large and full sized, medium sized and well shaped : 6 as small and 4 as very small, 2 as small and indifferent. Dr. Robb reported the results in the 8 tubes which were sent to the Central circle as follows, viz. :—8 children operated on and 36 punctures made. The result in 2 children was unknown, so it may be said that there were only 6 children and 29 punctures, 10 vesicles large, round, and well filled, with good lymph, appeared on 4 children and in the other 2 there were no vesicles at all. If lymph can be thus successful in July after being transmitted by means of tubes through the post several hundred miles it is only reasonable to suppose that it should be more so when used from arm-to-arm. The animal lymph having failed in Bombay it became necessary to supply the superintendent of the Presidency circle with lymph sent in tubes from the other circles, and I regret to say, Mr. Anantá Chandrobá's results, with the lymph so sent, were very unsatisfactory—while he was failing with the tube-lymph in Bombay, tubes taken from the very lots that were sent to him were successful in the hands of others. In the month of August he had only 10 successful, 5 unknown and 83 failed out of 98 children. In September he operated on 53 with tube-lymph and got 25 successful, 3 unknown and 25 failures. I am not quite satisfied about the unsuccessful results with tube-lymph in Bombay and should it again be necessary to resort to its use I shall myself watch the practice.

English vaccine lymph.

13. During the year there were two supplies of vaccine *virus* received in tubes through this Government from Her Majesty's Secretary of State for India. One supply of 25 tubes was received in November and the other supply of an equal number of tubes in January. I think the whole came from the National Vaccine Institution in London, but I cannot say positively as I had no advice with the supplies. In future I should be informed whence the lymph comes. The following table shows the result of the use of both supplies :—

Whence received.	Vaccine circle in which tested.	Number of				Character of vesicles.	Remarks.
		Tubes tested.	Children operated on.	Insertions.	Resulting vesicles.		
England.	Presidency	3	3	14	3	Excellent.	Failed in 2 children.
	Central	4	5	24	4	Successful.	In 4 of the 5 children successful.
	Southern	4	12	58	6	Small.	Most of the vesicles small.
	Western	4	...	...	...	.....	Tubes broken in the post.
	Eastern Gujarath...	3	3	13	...	.....	Total failure.
	Western do. ...	3	3	18	5	Successful.	In one of the 3 children failed.
	Sindh	3	4	24	...	.....	Total failure.
	Total	24	30	151	18		
	Presidency	3	4	20	13	Good.	Successful in all children.
	Central	3	3	14	6	Excellent.	Successful in all children.
	Southern...	3	4	24	8	Small ...	Lymph good.
	Western	3	3	14	1	Good ...	
	Eastern Gujarath ...	3	3	12	...	.....	Total failure.
	Western do. ...	3	4	24	5	Small ...	Lymph good.
	Sindh	3	3	18	5	No remark.	Successful only in 1 child.
	Baroda	2	4	...	1	Successful.	Successful in one child from which a good supply of lymph was obtained.
	Kutch	2	1	10	...	.....	From one tube a calf was successfully inoculated but total failure in child with the other tube.
	Total.....	25	29	136	39		
	Grand Total	49	59	287	57		

I am unable to give any reason for this English lymph being less successful than usual.

Lymph sent to Africa.

14. Lymph was sent to the late Dr. Livingston by the mail of 7th October 1872, but what became of it I am unable to say. In February last, lymph was sent

to the civil surgeon of Zanzibar. Supplies were repeatedly sent to officers in the Central Provinces and in short it was given to all applicants.

Animal vaccination.

15. The practice of animal vaccination has been carried on in Bombay nearly the whole year and for a portion of the year in Poona and Bhooj and it will shortly be begun at Barsee. Dr. Williams does not say in his report whether it was continued at Sukkur or not. In Bombay cow-lymph is much esteemed and has overcome one great obstacle to vaccination and that was the unwillingness of parents to allow lymph to be taken from children's visicles.

Population.

16. In 1871 I estimated the population of this Presidency with its subordinate native states at 21,000,000: but the census which was taken in 1871 shows that my estimate was considerably under the real number. I am indebted to Dr. Lumsdaine for a "proof copy" of populations and areas which enables me now to form a correct judgment as to the progress of vaccination in every district; previously, I never could do more than hazard an opinion. Statement No. I. shows a population of 24,362,409 to which must be added about 123,220 for the military stations: this makes a total of 24,485,629, and if we add the civil population of the military stations of Mhow, Nímach and Nasirábád, from which we receive vaccination returns, the population in which we carry on vaccination, must be in round numbers about 24,500,000.

Birth-rate taken at 30 per mille.

17. In the British territory of this Presidency there are now birth and death registers kept by village officers, but, it is perfectly certain that the registrars do not register anything like all the births. Hitherto I have usually reckoned the birth-rate at 30 *per mille* but I feel very great doubt about this being high enough. There is only one country in Europe, France, which has a lower birth-rate than 30 per mille. The most recent information which I can obtain shows that—

In England	the birth-rate is	35·1	per mille.
„ France	„	26·3	„
„ Belgium	„	32·9	„
„ Prussia	„	38·4	„
„ Italy	„	37·1	„
„ Russia	„	49·0	„

As far as the above figures can afford any indication of what the birth-rate may be in India, France should be excluded from consideration, for there is a very general belief among statists and physiologists that the birth-rate in France is kept down intentionally. In a conversation which I had with the distinguished Professor Virchow in Berlin he stated that he had no doubt of this. Well, in taking an average of the remainder in the above group of nations the birth-rate is 38·5. Russia stands by far the highest; and in respect to the practice of early marriages is more like India than any of the other countries. I think it is very probable that the birth-rate in Bombay Presidency is really about or over 33·3 *per mille*—but taking

the lower number of 30 per mille there should be in a population of 24,500,000 about 735,000 births *per annum* and if a thirteenth be deducted for still-born and those who die and get small-pox before the vaccinator can reach them, there should be 678,462 available for vaccination annually or only 52,544 more than were primarily vaccinated in the year under report; so it will be observed that the annual increase in primary vaccinations cannot go on at the rate of the last few years, but a steady increase of revaccinations may be reasonably expected: and doubtless the annual increment to population will give a corresponding increase of births and consequently of vaccinations.

There should be 678,462 children annually available for vaccination.

18. The increase in the number annually vaccinated and revaccinated is very marked in the last six years as the following figures show :—

Great increase in the number vaccinated annually in the last 20 years.

In	1853-54	the vaccinations numbered	206,110
„	1863	do. do.	267,995
„	1868	do. do.	426,253
„	1873-74	do. do.	652,223

In twenty years the vaccine operations have more than tripled and in the year under report, the number of persons primarily vaccinated was 625,818—I include in this number the 1,122 successful cases in the British army—this is only 52,544, less than the available number of 678,462, so the primary vaccinations have reached fully 9-10ths of the number of children that may be considered annually available for a series of years.

19. Although we have in the past year primarily vaccinated 25·5 per mille of population and 23·1 successfully—which may be considered satisfactory—still a glance at the figures shows how very unequal is the rate *per mille* in the different districts. The successful primary vaccination is as high as 4·21 per cent. of population in the Sindh circle and as low as 0·46 in Kutch, where vaccination is still very backward; but I am happy to say that Major Goodfellow, the political agent at Bhuj, is interesting himself in the subject and he hopes soon to put vaccination on a better footing in H. H. the Ráo's dominion. It is also to be regretted that it is so low in the Presidency, Southern and Barodá circles.

The rate per mille of population primarily vaccinated is 25·5.

20. The following table shows the number of persons successfully vaccinated primarily in relation to the number of population in each circle, and it shows the absolute degree of protection given to the children in the year 1873-74. I have excluded revaccinations because they afford no indication of the extent of protection among children.

The percentage of primary successful vaccination in relation to the number of population.

Circles.	Total number of persons primarily vaccinated successfully.	Populations.	Percentage of population primarily vaccinated successfully during the year 1873-74.
1. Presidency	8,665	644,405	1·34
2. Central	108,268	4,828,850	2·24
3. Southern...	82,048	4,757,127	1·72
4. Western	63,879	3,070,259	2·08
5. Eastern Gujarath	76,891	3,112,490	2·47
6. Western Gujarath	97,813	3,142,153	3·11
7. Sindh	96,929	2,300,711	4·21
8. Baroda	24,328	2,000,225	1·21
9. Kutch	2,269	486,900	0·46
Aden	818	19,289	4·24
Native army	5,245	109,697	4·78
Total	567,153	24,472,106	2·31

The British army figures are excluded from the above table as they do not show the vaccinations and revaccinations separately, and the return shows nothing but successful.

Revaccination.

21. The Surgeon General, Indian Medical Department, in his letter No 3216 dated 13th September 1872 called the attention of all the Deputy Surgeons General to the following remarks which appeared in the "Madras Monthly Journal of Medical Science" for September 1872, regarding the results of revaccinations by the Surgeon of the Sappers and Miners in Bangalore:—"In 108 vaccinations "of sepoys who had marks of previous small-pox, 84 were successful; in 98 "who had *good* marks of previous vaccination, 77 proved successful; and of "67 men who had marks both of small-pox and previous vaccination 44 "were successfully revaccinated. These remarks are contrary to ordinary "belief, to say the least of it, and we are glad to know that the Inspector "General (Madras) has ordered a repetition by others of the experiment." The Deputy Surgeons General communicated with Dr. Turnbull (then acting Superintendent General of Vaccination) as to the best method of carrying out revaccinations in regiments and jails and he suggested that the following points should be carefully attended to:—

1*st*. Persons who bear distinct marks of vaccination or small-pox should alone be considered as revaccinated when operated on.

2*nd*. In revaccinating, lymph from good primary vesicles only should be used, and lymph from broken vesicles or vesicles with an inflamed areola should never be used.

3*rd*. The revaccinations should be performed by the surgeon of the regiment or by a competent vaccinator.

4*th*. The result should be recorded by the medical officer of the regiment or jail himself.

How far these instructions have been carried out I am unable to say, but I can say that the results were not always recorded by the medical officers themselves but sometimes entrusted to their subordinates. I have received only the returns of the operations in most cases without any report stating that these simple rules were observed or not. The reports from Deputy Surgeons General Maitland and Johnstone are so interesting that I have added them to this report along with two special reports on revaccinations in Rajkot and Kárwár jails by Surgeon Major Sexton and Surgeon Goldsmith. In the past year there were 2,585 revaccinations in the native army of which 1,182 were successful, 1,266 unsuccessful and in 137 cases the result was unknown. The percentage of success was 48·2. In the whole presidency there were 26,693 revaccinations, of which 14,894 were successful, 7,748 unsuccessful and in 4,051 the result was not ascertained. The percentage of success was 65·7. I would observe here that the army percentage of success is probably the more correct. I have in para. 11 pointed out how difficult it is to place a true value on the percentage of success as recorded by different persons in revaccinations.

Cost.

22. The expenditure in 1873-74 was Rs. 2,16,076-8-4 or an increase of Rs. 5,281-7-5 over the preceding year which was caused by 1st the circumstance that for eight months of the year there were no acting officers drawing less than the full pay of the superior appointments and 2nd by the number of assistant superintendents and clerks having been increased since the 1st November. A still further increase of expenditure will occur in future from the second cause. The following figures show the sums expended by each establishment:—

Establishments.	Total expenditure.	Compared with the preceding year.	
		Increase.	Decrease.
	Rs. a. p.	Rs. a. p.	Rs. a. p.
Imperial	1,05,198 11 9	5,317 9 6	... ...
Municipal	15,659 12 7	... ...	268 11 9
Local Fund	59,158 0 6	... ...	30 14 8
Native Chiefs	36,059 15 6	263 8 4	... ...
Total	2,16,076 8 4	5,581 1 10	299 10 5
Deduct decrease.....Rs.		299 10 5	
Net increase.....Rs.		5,281 7 5	

The decrease in the municipal establishment was caused by the abolition of the vaccinators already mentioned in para. 4. The cost of each successful vaccination varies a good deal in the different establishments as shown below :—

	1873-74		1872-73	
	As.	p.	As.	p.
Municipal.....	5	2	5	10
Local Fund.....	2	10	3	3
Native States.....	3	3	3	5

The two Government vaccinators (civil) are excluded from the above calculation because their cost cannot be separated from the administration charges, and the expenditure on account of administration and superintendence is also excluded here. There has been a decrease in the cost of each successful case of 8 pies in municipal, 9 pies in local funds and 2 pies in native states. Taking the whole expenditure into account the cost of each successful vaccination was 6 annas and 2 pies or 6 pies less than in the preceding year.

The cost of each successful vaccination in a circle is considerably influenced by the pay of the superintendent which, of course, depends on rank and is beyond my control : I will therefore show below the cost of each successful vaccination after excluding the pay of the superintendent from the total cost in each circle, and after excluding the 4 army vaccinators altogether from consideration :—

Name of Circle.	Name of Superintendent.	Successfully vaccinated and re-vaccinated.	Total cost excluding pay of Superintendent.	Average cost of each successful vaccination.	Number of vaccinators.
			Rs. a. p.	Rs. a. p.	
1. Presidency.....	Mr. Ananta Chandroba	9,897	6,476 1 9	0 10 5	11
2. Central	Drs. Robb, Turnbull and Gordon.	105,591	26,631 0 10	0 4 0	65
3. Southern	Mr. Raby	80,974	24,874 15 2	0 4 1	68
4. Western	Mr. Cody	62,446	20,650 5 11	0 5 3	49
5. Eastern Gujarath...	Dr. Cola.....	74,851	20,691 6 2	0 4 5	46
6. Western do. ...	Drs. Butler and Blomfield.	97,810	23,221 10 4	0 3 9	52
7. Sindh	Dr. Williams.....	98,908	25,338 4 11	0 4 1	50
8. Baroda	Dr. Seward.....	24,678	7,085 1 0	0 4 7	23
9. Kutch.....	Mr. Dorabji Hormasji ...	2,273	2,319 11 10	1 0 3	11
Aden	Drs. James and Hay ...	876	504 0 0	0 9 2	2
	Total.....	558,304	157,792 9 11	0 4 6	377

It will be observed that vaccination is dearest in Kutch, and I think it need not be so, were the establishment there properly organized. In Bombay vaccination must always be more expensive than in the other circles for many reasons. The cost in Aden was unnecessarily high because, by a mistake there were 2 vaccinators instead of only one—this has been remedied. The cost in the Western circle is the next highest but, I think, we may expect a decrease there in the current year. The other circles do not vary very much. The general average is only 4 annas 6 pies, which is a very moderate sum.

Commendation of superintendents.

23. It affords me the very greatest pleasure to report that all the officers serving in the department have done their best to perform their duties to the very best of their powers. How well this has been done is plainly demonstrated in the following table of figures showing the work of each superintendent:—

Name of Circle.	Name of Superintendent.	Number of encampments.	Number of travelling days.	Distance travelled in miles.	Number of villages visited.	Number of vaccinated children inspected.
1. Central	Drs. Robb and Turnbull.	58	87	1,233	201	5,916
2. Southern	Mr. Raby	61	139	1,488	246	9,738
3. Western	Mr. Cody	109	215	2,288	494	14,425
4. Eastern Gujarath...	Dr. Cola	66	166	2,064	503	12,947
5. Western do. ...	Dr. Butler	86	184	2,135	393	29,025
6. Sindh.....	Dr. Williams.....	126	155	2,822	532	20,925
	Total.....	506	946	12,030	2,369	92,976

These figures show that Drs. Williams and Cody made the greatest number of encampments; that Drs. Cody and Butler travelled the greatest number of days; Drs. Williams and Cody travelled the greatest number of miles. I may add that Dr. Williams travelled 212 miles by rail without much apparent object as far as vaccination is concerned. Drs. Williams, Cola and Cody visited the greatest number of villages—but it must be observed that the number of villages is no very good guide to estimate the work of a superintendent, because in Sindh every cluster of 2 or 3 houses is reckoned a village, whereas in the Dekhan such a hamlet would be reckoned a wádá or a part of the village proper. Superintendents might I think fairly reckon a wádá as a village, as far as their inspections are concerned—indeed, it seems to me that it would be better for them to do so. It is probable then, that the excess of villages inspected by Dr. Williams is so far only apparent and not real. Drs. Butler and Williams, inspected, by far, the greatest number of vaccinated children; but to estimate the work of inspecting children I must add the following table which shows the number of vaccinated children whose names were called from the registers—which is the real test of the vaccinators' work:—

Circle.	Work tested by calling names from register.								
	Present during inspection.			Absent during inspection.		Number of persons whom the vaccinator has returned as vaccinated.			
	Successful.		Unsuccessful including bad.	Absence accounted for.	Absence unaccounted for.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.
	Good.	Middling.							
1. Central	3,773	393	432	2,187	1	5,903	351	532	6,786
2. Southern	3,753	820	684	2,745	125	7,001	486	542	8,029
3. Western	10,376	...	898	4,485	16	14,494	772	543	15,809
4. Eastern Gujarath	6,427	3,805	1,510	3,477	...	13,831	866	495	15,192
5. Western do.	6,963	...	931	1,642	5	8,559	607	375	9,541
6. Sindh	4,323	290	209	1,753	20	6,091	205	299	6,595
Total	35,615	5,308	4,664	16,289	167	55,879	3,287	2,786	61,952

It will be observed from these figures that Mr. Cody and Dr. Colá stand by far the highest—but I am of opinion that even the lowest is quite as high as there is any necessity for—now that this work is so thoroughly done by the assistant superintendents. In the Central circle Drs. Robb and Turnbull inspected, by calling the names, the lowest number of children, except Dr. Williams in Sindh, and yet there were quite sufficient names called over 1st to prove that, the vaccinators' records were correct and 2nd to test the inspections of the assistant superintendents. I consider it no longer necessary for superintendents to inspect as much as before the creation of assistant superintendents; five or six thousand names called over in the year is I believe ample to test the work of the vaccinators and to see that the assistant superintendents report their inspections faithfully. Superintendents, I think, should try to see as many vaccinators as possible on their tours, giving words of encouragement here and of censure there: they should make a point of visiting places where there are difficulties to overcome, and help and encourage both the vaccinator and assistant superintendent to overcome them. The office work has, of course, increased *pari passu* with the strength of the department and it is now one of the most important parts of a superintendent's duty. I think the names of Drs. Butler, Williams, Cody and Colá deserve special mention. Dr. Turnbull was not in charge of the Central circle for the whole year as he acted for me as superintendent general for fully four months, but I know his circle is in first rate order, which is the result of his long and able superintendence of it. I am of opinion that superintendents of vaccination might be made very useful to the sanitary department without in any way impairing their efficiency as officers of this department.

Assistant superintendents.

24. The assistant superintendents have been, with one or two exceptions, reported as all that can be desired—in short, they have, after three years' trial, realized all that was expected of them. The exceptions are two in the Southern circle, both of whom I have seen, and I feel sure that both will greatly improve. In the above remarks I refer to these men, as assistant superintendents of vaccination only, but I have no doubt, they might also be made useful to the sanitary department: for instance they could inspect village registers of births and deaths, and each could bring to notice any very obvious insanitary conditions observed in his zilhá. It gives me very great pleasure, indeed, to report so favorable on this body of officials and to add that they give promise of a still further and more extended usefulness. Government may rest assured that the creation of this class of vaccine officials has turned out a perfect success. I will here record the names of Mr. Hásá Mal in the Sindh circle and Mr. Balwantráo Rájárám in the Central circle as pre-eminent among them for zeal and intelligence. The former distinguished himself in Upper Sindh by stamping-out several outbreaks of small-pox and the latter in Satárá zilhá has brought the vaccinators there into first rate order; I will reward him by promotion to 2nd class on 1st August next, when he will have completed his qualifying 3 years in the 3rd grade. Mr. Hásá Mal is already in the 2nd grade—Mr. Ranchoddas Mangaldas and Sardarmiya Nanamiya have been prominently brought to notice by Dr. Butler as very zealous in the performance of their duties. Others have done their duty well but have not been specially brought to notice because in 1873-74 there were no exceptional circumstances in the other circles to contend with.

Operations of the different establishments.

25. There has been an increase of operations by all establishments, but not by all circles, as there is a decrease in the Presidency and Barodá circles as the following figures show :—

Circles.	Total number of persons vaccinated and revaccinated.		Compared with the preceding year.	
	1873-74.	1872-73.	Increase.	Decrease.
1. Presidency	13,907	16,415	.....	2,508
2. Central	121,541	119,560	1,981	.....
3. Southern	96,648	80,697	15,951	.....
4. Western	71,290	63,626	7,664	.....
5. Eastern Gujaráth	85,584	78,206	7,378	.....
6. Western do.	111,253	110,432	821	.....
7. Sindh	111,124	78,314	32,810	.....
8. Baroda	27,781	29,661	.....	1,880
9. Kutch	2,476	2,232	244	.....
Aden	1,265	684	581	.....
Total	642,869	579,827	67,430	4,388
		Deduct decrease ...	4,388	
		Net increase.....	63,042	

2 ...

The 2 Government vaccinators' work.

26. There are only 2 Government vaccinators (civil). They operated on 4,380 persons or 915 more than in the preceding year. They average 2,190 each.

The 48 municipal vaccinators' work.

27. There were 48 municipal vaccinators or 3 less than in 1872-73. The vaccinators for Kaládgi, Bárámati and Khánápur having been abolished: the first from the beginning of the year, the second from July and the third from November. The Khánápur vaccinator was abolished for want of funds and the Bárámati one on the opening of a dispensary there. The Wálwá and Karhád municipal vaccinators ceased to exist on 1st April 1874. The municipal vaccinators operated on 59,116 which is 1,562 more than in the preceding year and gives an average of 1,231 for each vaccinator. The increase and decrease in circles is shown below:—

Increase.		*Decrease.*	
Southern Circle	507	Presidency Circle	2,508
Western do	46	Central do.	736
Eastern Gujaráth Circle	471		
Western Gujaráth do.	947		
Sindh Circle	2,254		
Aden	581		
Total increase	4,806	Total decrease	3,244
Deduct decrease	3,244		
Net increase	1,562		

I am of opinion that no town having a population of less than 20,000 should maintain a municipal vaccinator, because a less population cannot give him enough of work. It is a waste of power keeping up a vaccinator for too small a population and it would be much better to replace every municipal vaccinator whose charge does not amount to 20,000 souls by a local fund vaccinator who would be generally available in the táluká. The average number vaccinated by each municipal vaccinator is 591 less than the average for the local fund vaccinators and the cost of each successful vaccination by municipal vaccinators is 5 annas and 2 pies while it is only 2 annas and 10 pies by local fund vaccinators. Again the percentage of success is 92·9 by municipal vaccinators and 95·2 by local fund vaccinators. There is no doubt that a municipal vaccinator in a large town is necessary, but I must say that, a municipal vaccinator is more costly and less useful in a small town than a local fund vaccinator for the táluká would be.

Where there is a municipal vaccinator he should have charge of the town, where there is none, the Dispensary officer should vaccinate the town.

28. In accordance with the instructions contained in the 13th para. of Government Resolution No. 3998 of 25th November last, I requested all superintendents of circles to inform municipal vaccinators that they will be held responsible for the vaccination of the towns which pay them and that where there is a dispensary but no municipal vaccinator a special peon should be appointed to assist the dispensary officer in carrying on vaccination. As yet I have only received a report regarding the action of the superintendent of the Southern circle and he says that:—In Belgaum collectorate the Athni dispensary officer has been provided with a peon. No more is required in this zilhá. In Kanada zilhá, Mr. Macdonald has made arrangements for providing a peon whenever required by a dispensary

officer, although this is not a special peon still I think it will be sufficient. In Kulladghi and Dharwad there is a municipal vaccinator wherever there is a dispensary.

All students are to qualify as vaccinators before receiving a charge.

29. It has been arranged by the Surgeon General that the students of the Grant Medical College shall study vaccination after passing their examinations and before receiving charge of a dispensary. This is in obedience to the order in the Resolution quoted in the preceding para.

The 202 local fund vaccinators' work.

30. The local fund establishment of vaccinators numbered 202 or one more than in 1872-73; the additional one was appointed to the Supa petha by Mr. Macdonald when small-pox was raging in it. They operated on 368,053 or 50,537 more than in the preceding year. The average number for each vaccinator is 1,822. From the figures below, showing the increase by circles, it will be observed that the greatest increases took place in the Sindh and Southern circles—and the least in the Western Gujaráth circle :—

	Increase.
Central Circle	1,972
Southern do.	14,543
Western do.	4,161
Eastern Gujaráth Circle	2,297
Western Gujaráth do.	445
Sindh Circle	27,119
Total increase...	5,0537

The number of persons primarily vaccinated in Sindh is considerably in excess of the estimated births, so no further increase is likely to occur there and in the Western Gujaráth circle the vaccinations nearly equal the available children so no increase is likely to occur there either, but some further increase may be expected in the other circles, and a very considerable increase may be expected in the Southern circle.

The work of the 125 native states' vaccinators.

31. The number of vaccinators maintained by native states was 125 or 6 more than in the preceding year. I have already mentioned that these increases were made by the Chiefs of Sángli and Miraj and by H. H. Mír Alí Murád and H. H. the Ráo of Kutch. The number of persons operated on was 191,331 or an increase of 8,670. Each vaccinator's average is 1,530.

The following figures show where the increases and decreases occurred:—

Increase.		*Decrease.*	
Central Circle	395	Western Gujaráth Circle	2,673
Southern do	2,425	Barodá do.	1,880
Western do	3,037		
Eastern Gujaráth Circle	4,732		
Sindh Circle	2,390		
Kutch do.	244		
Total increase...	13,223	Total decrease	4,553
Deduct decrease...	4,553		
Net increase	8,670		

The decrease in the Western Gujaráth circle is of no sort of consequence as the vaccinations there are quite equal to the births; but the decrease in H. H. the Gaikawád's dominion is unfortunate: for there the vaccinations only reach 13 *per mille* of population when they might be double that number.

No annual report of vaccination received from Baroda.

32. I receive from the Residency Surgeon at Barodá the usual annual returns of vaccination for H. H. the Gáikawád's territory, but no annual report similar to what is received from the superintendents of other circles and from H. H. the Ráo of Kutch's medical officer. I am of opinion that an annual report should be furnished by the Barodá Residency medical officer for the purpose of showing this Government and H. M.'s Secretary of State for India the progress of vaccination in H. H. the Gáikawád's territory. Dr. Seward, who is the Residency Surgeon, has been good enough in a private note (which he has allowed me to make use of) to give me the following information which I give *verbatim et literatim* :—

"You are aware that I had last year in contemplation proposals design-
"ed to further and perfect vaccination within H. H. the Gáikawád's domi-
"nion, and your strong interest in the subject naturally leads you to desire
"some knowledge of what has been done in this direction.

"Well, the past year has been eminently unfavorable to any project
"for the expansion of the existing establishment, or the more effective over-
"seeing of its work.

"As you perhaps know the graver and more comprehensive exigencies
"of internal administration, have confronted His Highness's Government,
"and laid claim to its entire attention. I have thus felt that it would be un-
"availing if not impolitic, to press upon the consideration of the Resident,
"at least officially, those changes which under happier political circumstances I
"should have urged. I may have still some time to wait, but I wait assured,
"that with the opportunity will also come the effective support and coun-
"tenance of Colonel Phayre, to any programme for the improvement of
"the establishment, which I may legitimately submit to his discretion for
"friendly recommendation to His Highness." I hope Dr. Seward may soon see his way to improve and systematize the vaccine department in the territory of His Highness, for though not so backward as Kutch, H. H. the Gáikawád's vaccination department is far from being what it might easily be made without much increase of cost, indeed, it might be greatly improved at a very small additional cost.

Reorganization of vaccine department in the native state of Kolhapur by Surgeon Raby.

33. There are 11 vaccinators in the Kolhápur state and over them there is an assistant superintendent of vaccination who was selected for superior merit from among the state's vaccinators themselves. In 1870 Surgeon Raby brought to Colonel Anderson's notice that the pay of the vaccinators was insufficient, and a new scale was sanctioned then, but for some reason it was never introduced until Surgeon Raby returned from furlough in 1873, when he took up the subject again and was most heartily met by Colonel Anderson in every measure which would tend to improve the progress of vaccination.

The following scale of pay for the 11 vaccinators was introduced from 1st September 1873 :—

1	Vaccinator	for the	Vishálgad	táluká at	Rs. 25	per mensem.
1	Do.	do.	Kolhápur	do.	22	do.
1	Do.	do.	Buthargad	do.	18	do.
1	Do.	do.	Shirol	do.	16	do.
1	Do.	do.	Ajre	do.	16	do.
1	Do.	do.	Ichalkaranjí	do.	16	do.
1	Do.	do.	Báwrá	do.	16	do.
1	Do.	do.	Panálá	do.	15	do.
1	Do.	do.	Kágal	do.	14	do.
1	Do.	do.	Gadhinglaj	do.	14	do.
1	Do.	do.	Torgal	do.	14	do.

The assistant superintendent receives Rs. 75 per mensem which is just the same pay as the 3rd class assistant superintendents in Government employ receive. Colonel Anderson has, during the time he has been Political Agent in Kolhápur brought his influence to bear on the progress of vaccination not only in Kolhápur state but also in the Southern Marátha country generally. In 1863 the vaccinations were 18,341 ; for 1873-74 they reached 28,041 or an increase of nearly 10,000—and the number of vaccinators has only been increased from 19 to 24 during the same time.

34. Through Colonel Anderson's influence we recently got the Chief of Sánglí to appoint a vaccinator for Shirhatti from 1st April 1873 and one for Mangalvedá from December last. This chief now maintains three vaccinators.

Bhor.

35. In Government Resolution on last report the advisability of having a second vaccinator in the Bhor territory was noticed. I am happy to say that the Kárbhári has just arranged to appoint a second.

Kutch.

36. In Kutch the vaccine arrangements are still very defective and the progress of vaccination in that province is the worst in Western India; but Captain Goodfellow, the Political Agent, is giving the subject his attention and he gives me reason to hope that matters will shortly be improved. I would here bring to the notice of Government that Surgeon Wall, while on general duty at Bhuj, introduced the practice of animal vaccination there and also taught H. H. the Ráo's medical officer the method of carrying it on. As Dr. Wall had to leave Bhuj with a regiment he could not continue the practice long, but he deserves notice for his zeal in the cause of vaccination and for voluntarily having taken the trouble to try and improve the state of vaccination in H. H. the Ráo's territory.

Dispensary vaccination.

37. There is an increase of 1,358 persons operated on at dispensaries. I regret to observe a large falling off in the dispensaries of the Southern circle and a small decrease in those of the Eastern Gujarath circle. There is a large increase in the Sindh dispensaries. I would beg to bring to the notice of Government the meritorious exertions of the

late Assistant Surgeon Búlkrishna Chintobá, who did the most vaccinations of any dispensary officer and practised animal vaccination at the Poona dispensary; Assistant Surgeon Mackenzie, Kumptá dispensary; Honorary Surgeon Sinclair, Civil Hospital Kolhápur; Mr. Pollard, Dispensary Dápuli; Mr. Narsú Gurápá, Dispensary Sholápur; Assistant Surgeon Shántárám Vináyak Kantak, Godhrá dispensary; and Mr. Eskiel Isac, Larkháná dispensary. The increase and decrease is shown by cirles below :—

Increase.		*Decrease.*	
Central Circle	350	Southern Circle	1,524
Western do	420	Eastern Gujaráth Circle	122
Western Gujaráth Circle...	899		
Sindh Circle.....	1,335		
Total increase	3,004	Total decrease.....	1,646
Deduct decrease	1,646		
Net increase.....	1,358		

Although there is an increase, which is so far satisfactory, still I do not think the progress of vaccination at dispensaries is as good as I should like to see it. In my opinion the great object of carrying on vaccination by dispensary officers is to educate the people of the larger towns to seek vaccination at a certain place on a certain day. To achieve this will probably require the length of time it takes an infant to grow to be an adult and become the mother of a family—when she will probably seek the protection of vaccination for her children where she herself was vaccinated.

Army vaccination.

38. There is a slight increase of 824 vaccinations in the army as compared with the preceding year. The total number of persons operated on was 9,354 in a population of about 123,000. The returns from the British army only show successful cases. In the native army there were 2,585 revaccinations but I am unable to say how many there were in the British army.

Average number of persons operated on by each vaccinator.

39. According to Statement No. I. the average number of persons operated on by each vaccinator is 1,652 or 146 more than in the preceding year. The average number of persons operated on by establishments is as follows :—

1st, 2	Government	vaccinators'	average is	2,190
2nd, 48	Municipal	do.	do.	1,231
3rd, 202	Local Fund	do.	do.	1,822
4th, 125	Native State	do.	do.	1,530

But it is more interesting to show the average work of each vaccinator by circles. From the following figures it will be observed that Sindh and Western Gujaráth circles are considerably ahead of all others and the Presidency and Southern circles are again the lowest among Government

circles : but Kutch circle is absurdly low and Barodá circle might easily be improved. The average number for each vaccinator can never be very high in the Presidency circle and I think the past year's average is very fair for it : —

Circles.	Average number of persons vaccinated by each vaccinator.	Names of Superintendents.
1. Sind	2,146	Surgeon J. Williams, M.D.
2. Western Gujaráth	2,090	Surgeon Major E. R. Butler, M.D.
3. Central	1,805	Surgeon Major P. S. Turnbull, M.D.
4. Eastern Gujaráth.....	1,784	Dr. Mancherji Berámjì Colá.
5. Western	1,407	Surgeon T. Cody.
6. Southern	1,348	Surgeon J. Raby.
7. Presidency	1,264	Mr. Anantá Chandrobá, G.G.M.C.
8. Barodá	1,207	Surgeon Major G. E. Seward, M.D.
9. Kutch	225	Mr. Dorábji Hormasjì, G.G.M.C.

Small-pox.

40. In table No. VII. I have added a column showing the number of deaths from small-pox in each registration circle during the calendar year 1873 and the total number of deaths from this disease was 9,946 ; in the previous year it was 26,699. I may at once say that no reliance can be placed on these figures. In Bombay city the number of small-pox deaths for the official year 1873-74 was 405 and in the preceding year it was 1,637 ; but even in Bombay the figures are not reliable. Of the 405, it was said 19 had been vaccinated and on investigation it was found that 3 or 4 of the 19 had not died of small-pox at all ; but it was found that two boys who had been registered as successfully vaccinated died of small-pox about three months after being vaccinated. It would have been more satisfactory if Mr. Anantá Chandroba could have made quite certain that these 2 boys really had been successfully vaccinated. The boys were vaccinated on 20th January 1873: they lived in the same house, were vaccinated together, got small-pox at the same time and died about the same time. In the European army there were 10 persons attacked by small-pox in the calendar year 1873 and one died, the rest recovered. The girl who died was about 16 years old, was vaccinated in infancy and re-vaccinated in 1864. In the native army 116 cases of small-pox occurred during the official year 1873-74 and 66 remained from the previous year under treatment ; of these 5 died, 160 recovered, 1 was transferred and 16 remained under treatment at the end of the year. Of the 182 cases, 161 were vaccinated, so I suppose 21 were unvaccinated, but whether they were protected by small-pox or not does not appear from the returns, nor can I say whether the 5 deaths occurred among protected or unprotected, but as 3 deaths occurred among children it is probable they, at least, were unprotected. The question naturally suggests itself why were these 21 unprotected in

the native army where all children should be vaccinated, and adults vaccinated or revaccinated.

Small-pox in Sindh and Southern Circles.

41. Dr. Williams gives some interesting information regarding the introduction and stamping-out of small-pox in Sindh (vide page 45). Mr. Macdonald appointed an extra vaccinator for the Supa petha to overcome small-pox there; and old and young flocked to the vaccinator who was aided very much by Mr. Ram Krishnapa the Mahalkari of Supa (vide page 18, para. 9).

Inoculation.

42. It is reported that inoculators had been carrying on their baneful work in Wai táluká; but I am unable to say to what extent they did so.

Govind Moray transferred to the Berars as an assistant superintendent.

43. One of the Presidency circle vaccinators was permitted to accept an appointment of assistant superintendent of vaccination in the Berars.

Vaccino-Syphilis.

44. It appears to be very generally admitted that the virus of syphilis may be communicated to a person along with the vaccine virus; but it can only be so by the vaccinator being so careless as to imply an utter neglect of the most ordinary observation and caution. The communication of syphilis by vaccination must be one of the very rarest occurrences in the world and the testimony of the officers of the Bombay Vaccination Department alone proves this to be the case. Not one of us has ever seen such a case and only one case has ever been even spoken of, and in that case Dr. Turnbull's enquiries proved conclusively that vaccination had nothing to do with the syphilis. During the past year the medical officers of the department inspected 92,976 vaccinated children and the worst things they saw were neglected sores and an abscess or two—accidents which must be expected. The assistant superintendents saw 217,269 vaccinated children and in no case was there the least suspicion of syphilis having been communicated by vaccination. The attention of all in the department has been directed closely to this subject during the past 4 years and nothing has been seen.

Departmental rules.

45. During the year I drew up a set of rules for the department which will form a section in the new Medical Code, now being brought out. The vaccination forms have all been numbered with a serial number and bear the distinctive letter V. Several of the superintendents have drawn up subsidiary rules for the guidance of themselves, assistant superintendents and vaccinators and the others are about to do so.

Superintendents to pass in the language of their circles.

46. Government in their Resolution No. 107 dated 13th January 1874 directed all superintendents of vaccination to pass in the language of their districts by the end of next rains or forfeit their appointments. And all officers appointed to be superintendents in future must so pass within a year or forfeit the amount of difference between their pay of rank and the pay of a super-

intendent. I have much pleasure in reporting that Surgeon Raby passed in Maráthí on 21st November last and Surgeon Major Turnbull in March last; Surgeon Williams, superintendent of the Sindh circle, passed the higher standard in Sindhi some years ago ; Dr. Colá in the Estern Gujaráth circle has not been required to pass, as Gujaráthi is his mother tongue (Government Resolution No. 555 dated 24th February 1874); Surgeon Cody, superintendent of the Western circle, has applied for a committee to examine him.* There only remains Surgeon Blomfield, acting superintendent in the Western Gujaráth circle, and he intends to pass in Gujaráthí, at the end of this rainy season.

Inspection of vaccinated children.

47. During the year the superintendents inspected 92,976 vaccinated children in 2,369 villages or towns and the assistant superintendents inspected 217,269 vaccinated children in 10,745 villages or towns ; total inspected 310,245 vaccinated children in 13,114 villages or towns. We have no inspection returns from Presidency, Barodá and Kutch circles ; but as far as the Presidency circle is concerned, most of the vaccinated children are seen by the superintendent and the head vaccinator, so 11,814 should be added to the above total. I cannot say that there is any real inspection test in either of the native states of Barodá or Kutch: but the army vaccinations are seen by medical officers in charge of regiments and station staff, so that if we add the army returns we get a grand total of no less than 331,151 persons whose vaccinations were inspected. This is more than 50 per cent. of the total number of persons operated on, which is ample to test the quality of the vaccinations and the truthfulness of the returns.

Tour.

48. I returned from England on the 5th August after a two years' furlough and took over charge from Dr. Turnbull, (who acted for me during my leave,) on the 7th idem in Bombay. I went to Puná on the 18th and saw the vaccinators and their work there occasionally with the superintendent of the Central circle during the rains and also the practice of animal vaccination as carried on by the late Assistant Surgeon Bálkrishna Chintobá at the Khan Bahadur Pestonjee Sorabjee Dispensary in Poona and I also saw the Haweli táluká vaccinator's work, which was very good. In October I met Surgeon Cody, superintendent of the Western circle, at Tháná and examined the work of the municipal vaccinator there and at Kolset bandar and also the vaccinations performed at the dispensary in Tháná. On the 1st November I started on the regular tour. In company with Dr. Turnbull, the superintendent of the Central circle, I went through the zilhás of Puná and Ahmednagar, and with Surgeon Cody through Násik and Khándesh; then I turned south and marched through the zilhá of Sátárá, Kolhápur state, the zilhás of Belgaum, Dhárwád and joined Surgeon Raby, the superintendent of the Southern circle in Kánada, and together we went nearly over the whole of this zilhá. I returned to Bombay from Kárwár on the 3rd April 1874. On my route I examined the birth, death and vaccination registers in villages and the office records of superintendents, assistant superintendents and the vaccinators' work as well as records. On the whole I was well satisfied with the work of the vaccinators and the state of their records. The vaccinators in Kanada had their registers in the old form which was correctéd.

* He passed in Marathi on the 15th June 1874.

Truthfulness of returns.

49. The vaccination returns in British territory may be relied on as correct, or very nearly so—only one instance, of half a dozen false names, having been detected although the registers were tested to over 50 per cent. of the total entries. I cannot speak so positively of the returns from native states, particularly Baroda, where there appears to be no testing by a superior officer at all. Of the 310,245 names tested about fifty-five thousand were in native states' registers or fully 28 per cent.

Aid of civil and political officers.

50. The superintendents are unanimous in acknowledging the aid the department has received from the civil and political officers everywhere. In respect to this aid it may be said that without the countenance and aid of these officers, vaccination never could have progressed as it has done. There are only two zilhás where much active aid is required and these are Belgaum and Dhárwád. Mr Robertson, in the latter, told me himself that it is very difficult to persuade the Lingáyat Baniás of Ron and Ráníbadnúr tálukás. In the Chikodí táluká, I am happy to say the aid of the district deputy collector, Mr. Rámchandra Sakhárám, and mámledár, Mr. Raghunàth Narsú, has enabled the 2 vaccinators to vaccinate 3,608 or 1,485 more than in the preceding year, but still not much more than half what might be vaccinated had we more vaccinators for this very large and populous táluká. In this táluká the influence of Malhàr Hanmant, police pátil of Nipání, enabled the vaccinator to vaccinate over 400 persons in that town alone, and I saw a large number of these 400 who had been well vaccinated.

Conduct of vaccinators.

51. The conduct of the vaccinators, as a body, has been very favorably reported on; but among nearly four hundred vaccinators it may be expected that there will be instances of the ordinary failings. The following figures show the casualties :—

		Municipal	Local funds	Native states
Vaccinators.	Died	...	3	2
	Dismissed	3	9	5
	Resigned and discharged.	1	7	2
	Pensioned	...	1	...
Clerks.	Deserted	1		Government servants.
	Discharged	1		
	Resigned	1		

There was only one instance of falsification in British territory and that was in the Sindh circle, where a young vaccinator by name Ramchand had put six names in his October return which were also in his September return. Dr. Williams appears to be satisfied that it was a case of falsification and the man was dismissed. Other two instances of falsification occurred in the native states of Penth and in Káthewád (Manikwádá). Both were dismissed.

The progress of vaccination should now be shown by districts.

52. I think the time has now arrived, when we should show the progress of vaccination, in each district, in the body of this report: because we now have tolerably exact figures regarding the population both in British and native states' territory and we have an organization very nearly equal to the full requirements

of this presidency as far as vaccination is concerned. In the following remarks, I shall be as brief as possible; but even if they be longer than I expect, I feel sure it will be easier for the general reader to have the important points laid before him, than for him to attempt to analyse the tables and figures for himself : and, what is of equal importance, my remarks on the different districts will give, in few words, the chief points for comparison with the work to be shown in next report.

Presidency circle.

53. The Presidency circle consists of Bombay city ; which has a population of 644,405 and an area of 19 square miles. For this circle there is a superintendent, Assistant Surgeon Anantá Chandrobá, G.G.M.C., who had 11 vaccinators and 11 peons under him, during the past year, but there are now 16 and 5 respectively. They primarily vaccinated 10,027 persons, of whom 8,665 were successful, 1,187 unsuccesful and in 446 the result was unknown. Of the unsuccessful, only 271 were operated on a second time. The success was thus only 87·9. The cow-lymph was lost during the months of July and August and vaccination was carried on by lymph in tubes received from the other circles. The great number of failures with this tube-lymph swelled the unsuccessful and has affected the percentage of success for the whole year. There were 3,880 revaccinated of whom 69 were operated on twice. The percentage of success was 53·5. The average number of persons operated on by each vaccinator was 1,264. The total number of persons operated on was 2,508 less than in the preceding year. Mr. Anantá Chandrobá attributes this decrease chiefly to the great number of children protected by small-pox in the epidemic of that year. The exact number of births in Bombay is probably not known to any one but I estimate it at 25 per mille. Bombay like all large cities has a large number of non-breeding men who have left their wives in their country-homes, consequently the birth-rate is low. The number of births is probably about 16,000 and we might primarily vaccinate nearly 15,000 children per annum or just about 5,000 more than were primarily vaccinated last year. I estimate that there are probably 5,000 of the children born in 1873-74 left unprotected. With such an annual residue, there must inevitably be an epidemic of small-pox every few years ; especially as the disease is endemic in Bombay and is also constantly imported from the coast of Africa and the Persian Gulf. This cannot be considered satisfactory ; and what is even worse, I cannot promise myself much progress without a compulsory vaccination Act. I doubt very much if as large a proportion of children could be vaccinated in London, Liverpool or Manchester without a compulsory Act. At the end of the year, the number of vaccinators was increased from 11 to 16 and the peons diminished from 11 to 5, in the hope that more operators will be able to cover more of the city, and so still give further facilities to the people to obtain vaccination. There is now little or no trouble given to parents, for human-lymph is seldom used and a calf is taken to the very street where work is going on. The average cost of each successful vaccination is high (Rs. 1-1-3) as compared with the other circles; but this is unavoidable, even with a compulsory Act it will be high. Since writing the foregoing lines Dr. Weir, the Health Officer of Bombay Municipality, has been so good as to inform me that there were 15,665 deaths and 12,722 births registered in the calendar year 1873. If these figures be correct the inhabitants of Bombay city must be fast dying out: but I think it is more reasonable to say that the figures are not correct.

54. The Central circle now consists of the collectorates of Puná, Ahmadnagar, Sholápur, Sátárá and Ratnágiri and of the native states of Akalkot, Bhor, Jat, Atpadi and Phaltan. The population of the circle is 4,828,850 and the area is 27,656 square miles. There are 1 superintendent, Surgeon Major Turnbull, M.D., 5 assistant superintendents and 65 vaccinators. There were 121,541 persons operated on, the particulars of which will be given for each district of the circle.

Progress of vaccination in Central circle.

55. The population of Púna collectorate is 878,785 and the area 5,095 square miles. There were 1 assistant superintendent and 12 vaccinators, viz., 8 local fund and 4 municipal, and vaccination was carried on at 6 dispensaries. The total number of persons primarily vaccinated was, by the rural vaccinators 15,079 and 1,897 at dispensaries—total 16,976, which gives 19·3 per mille of population. The chief reason of the total not being more is that the tálukás of Háweli, Khed, Juner and Bhimthadi are each too large and too populous for one vaccinator. I hope we will be able to get a second vaccinator for each of these tálukás. The revaccinated number only 19. The average number of persons operated on by each vaccinator was 1,257, which is considerably below the average for the whole presidency and still more below the average for the Central circle. This is partly attributable to the vaccinator of Sirúr táluká having only vaccinated 778. The amount of work in this zilhá cannot be considered quite satisfactory, nor can it become so until four more rural vaccinators be appointed. The superintendent has recommended this increase of vaccinators and after going through Púna collectorate I came to the conclusion that they are necessary.

Púna collectorate.

56. The Ahmadnagar collectorate contains 769,955 souls and has an area of 6,647 square miles. There are 12 vaccinators, viz., 11 local fund and 1 municipal. There were 20,153 persons primarily vaccinated of whom 145 were vaccinated at two dispensaries. This gives 26·1 *per mille* of population. The percentage of success is very good, 96·8. There were only 24 revaccinations. I went through this zilhá with the superintendent and consider the work very satisfactory.

Ahmadnagar collectorate.

57. The Sholápur collectorate has 662,986 of a population and is 3,925 square miles in size. There are 9 vaccinators, viz., 6 local fund and 3 municipal; and vaccination was practised at 3 dispensaries. There were 14,737 persons primarily vaccinated or 22·2 per mille of population. The precentage of success is 93·6. There were only 29 revaccinations. The progress is satisfactory but the tálukás of Madhe and Karmálá are too large, both as regards area and population, for one vaccinator each—there ought to be two in each of these tálukás.

Sholapur collectorate.

58. The population of Sátárá is 1,116,050 and the area 5,378 square miles. There were 12 local fund and 4 municipal vaccinators, but now there are only 2 of the latter, viz., one for Sátárá town and another for Malsiras. One was abolished in November last and the other two on 1st April last. Vaccination was also practised at 6 dispensaries. The

Satara collectorate.

number of persons primarily vaccinated was 29,250 or 26·2 per mille of population. The success was 96·3 per cent. There were only 98 revaccinations. The progress here is very satisfactory. The reason of Sátárá zilha being so well vaccinated is that, in 1863 a number of municipal vaccinators were appointed to supplement the weak staff of Government vaccinators. The Honourable F. S. Chapman was then collector of the zilha and Mr. Plumptre was the superintendent of the Southern circle. That was the first step taken to have municipal vaccinators and the efforts of these two officers has borne good fruit: but after the appointment of a local fund vaccinator to each taluka it has been found unnecessary to keep up as many municipal vaccinators as at first.

Ratnagiri Collectorate.

59. The Ratnágiri collectorate has a population of 1,019,136 and an area of 3,789 square miles. There are 11 local fund vaccinators, and two dispensary officers carry on vaccination. There were 33,067 primarily vaccinated persons or 32·4 per mille of population. There were 1,465 revaccinations. For some years back the progress of vaccination in this zilhá has been markedly ahead of all others. Deputy Surgeon General Johnstone was some years ago superintendent of vaccination in the Konkan Division, and I thought he might be able to account for the great progress of vaccination in this zilha, so I asked for his opinion. He seems to think that the efforts of Mr. Coles, who was collector, has had a considerable effect in bringing the practice of vaccination into esteem. I think Dr. Johnstone's own exertions must also have had some influence in the matter.

Native states in Central circle.

60. The five native states of Akalkot, Bhor, Jat, Atpadi, and Phaltan have a population of 381,938 and an area of 2,822 square miles. There are 5 vaccinators, that is one for each of the states; but Bhor which is the largest is about to appoint a second, as one man is not equal to the charge of 111,689 souls spread over 875 square miles. The number of persons primarily vaccinated is 5,489 by the itinerant vaccinators and 231 at the Akalkot dispensary—total 5,720 or 14·9 per mille of population. The percentage of success was 95·7. There were only 3 revaccinations. There is evidently plenty of room for progress in these states.

Progress of vaccination in the Southern circle.

61. The Southern circle is superintended by Surgeon Raby. It consists of the Collectorates of Belgáum, Dhárwád, Kaládgi, and Kánadá and of the native states of Kolhápur, the Southern Marátha Country and Sawantwadi There is a population of 4,757,127 and an area of 28,104 square miles. There are 5 assistant superintendents and 68 vaccinators. There were 96,648 persons operated on.

Belgaum collectorate.

62. The Belgáum collectorate has a population of 933,420 and an area of 4,589 square miles. It has had during the past year 10 vaccinators—8 local fund and 2 municipal; and vaccination was practised to a small extent at the dispensary of Athni. The number of primarily vaccinated persons is 14,824 or 15·8 per mille of population. The success is 92·0 per cent. There were 426 revaccinations. The progress of vaccination is

very unsatisfactory and I fear it must continue so until more vaccinators be appointed. I have just had a letter No. 641, dated 11th May 1874, from Mr. Grey in which he says "the local and municipal funds of this district cannot "bear any further charges for vaccination, and the proposal to appoint more "vaccinators cannot be entertained." I leave it for Government to say whether this shall be final or not. I will only add that, after having gone through this collectorate last cold season, I am thoroughly convinced more vaccinators are necessary; but instead of getting more there is some talk of abolishing the Gokák municipal vaccinator: if this be carried out there will be only 9 vaccinators, each of whom will have an average population of 103,713 while the average for the whole presidency is about 64,300. These 9 vaccinators would require to vaccinate an average of 2,872 children per annum to protect all, and last year the average in this zilhá was 1,501. Nothing I could say would demonstrate the necessity for an increase of vaccinators better than these figures do. Mr. Grey and his assistant collectors and district deputy collector all recognize the want, and have expressed their opinions that there should be, 4 vaccinators in Chikodi táluká and 2 in each of the talukas of Athni, Sampgaon and Parsgarh, and I think there should be two rural vaccinators in each of the tálukás of Belgaum and Gokak, then the municipal vaccinator of Gokak would not be required. Mr. Grey says in his letter to me, No. 566 of 27th April 1874, para. 2—"I consider it desirable that the "vaccination establishment should be increased to the extent proposed above, "but at the same time, I could not recommend that any charge should fall "either on the local or municipal funds." I had hoped I had things in train to get an increase, but here comes Mr. Grey and relieves Mr. Boswell and winds up the correspondence by saying there is no money for vaccination. This is a most discouraging result to my correspondence and to the labor I took to ascertain exactly what Belgáum requires. I still hope that some method may be found by Mr. Grey to give the necessary funds to bring the Belgáum vaccination establishment up to the strength which he himself thinks desirable.

Dhárwád collectorate.

63. The collectorate of Dhárwád contains 988,037 souls and its area is 4,565 square miles. There were 13 vaccinators employed during the year, viz., 11 local fund and 2 municipal. Another municipal vaccinator was appointed just at the close of the year for the town of Dhárwád. Vaccination was also practised to a very small extent at the dispensary of Hublí and in Dhárwád jail. There were altogether 16,569 persons primarily vaccinated or 16·7 per mille of population. The percentage of success was only 91·8. The revaccinations numbered only 36. The average number of vaccinations to each vaccinator is 1,181. There are several tálukás of this zilhá where there are some considerable difficulties. For instance, in Ránibadnur, where the vaccinator only vaccinated 424 persons and in Ron where the vaccinator did 695 vaccinations. Mr. Robertson, the collector, has, I know, taken much interest in the progress of vaccination for years back, in proof of this I may mention that he was one of the first revenue officers who suggested the propriety of supplementing the action of Government by aid from local funds. It is difficult for me to understand how it is that, the efforts of an able revenue officer like Mr. Robertson, should not be equal to the overcoming of some trifling objections on the part of, I believe, the lingayats of these two tálukás. However, I am glad to be able to say that even in these some little progress has been made and time with the well

directed efforts of Mr. Robertson and his assistants will doubtless help the vaccinator to win his way to the affections even of lingayats.

Kánadá collectorate.

64. The population of Kánadá is only 398,406 souls and the area is 4,235 square miles. The district is partly below and partly above the Ghats. It is mostly covered with forest trees and is much broken by creeks, ravines and hills. There were 10 vaccinators employed during the year, and there were some vaccinations done at 9 dispensaries. The total number of primarily vaccinated persons was 14,855 or 37·2 per mille of population. The percentage of success was 92·0. There were 934 revaccinations. Each vaccinator on an average operated on 1,390 persons. The progress here is very satisfactory and is due in a great measure to the very active interest taken in vaccination by Mr. Macdonald, the collector. This zilha has repeatedly suffered from small-pox within the last few years. When Kánadá was transferred to this presidency in 1862, the late Dr. Stovell made enquiries into the state of vaccination in it, the results of which are printed in his report for 1872 at page IV. Vaccination was then in a very unsatisfactory state if not "radically bad."

Kaládgí collectorate.

65. In the Kaládgí collectorate the population is 816,037 and the area 5,695 square miles. There were 10 vaccinators, 8 local fund and 2 municipal; in the previous year there were 3 municipal vaccinators for 10 months, but the Káládgi one was abolished in January 1873. There were 14,054 persons primarily vaccinated or 17·2 per mille of population. The percentage of success was 93·5. There were only 134 re-vaccinations. There should be, I think, at least 3 more vaccinators in this zilhá; and until there be, I fear, the progress of vacccination cannot be as satisfactory as I wish it.

Kolhápur, Southern Maráthá Country, and Sáwantwádi.

66. The population of the native states in the Southern circle is about 1,621,227 and the area about 9,020. There are 25 vaccinators and 2 dispensaries and they primarily vaccinated 33,115 persons or 20·4 per mille of population. The success was 95·6 in Sáwantwádi, 87·4 in Southern Maráthá Country, and 96·5 in Kolhápur. There were 1,701 revaccinations. Each vaccinator averaged 1,339. There is room for extension here, which will doubtless follow the recent increase of vaccinators.

Progress of vaccination in the Western circle.

67. The Western circle contains the collectorates of Tháná, Kolábá, Násik, and Khándesh and the native states of Janjirá, Jawar, and Penth. The population is 3,070,259 and the area 24,519. There are 6 assistant superintendents sanctioned but only 5 have been employed: there are 49 vaccinators and Surgeon Cody is the superintendent. There were 71,290 persons operated on.

Tháná collectorate.

68. The collectorate of Tháná contains 847,424 of a population and is 4,052 square miles in size. It has 13 vaccinators, 11 local fund and 2 municipal: vaccination is also practised at 9 dispensaries. There were 14,195 persons primarily vaccinated or 16·7 per mille of popu-

lation. The percentage of success is 91·4. There were 178 revaccinations. The average vaccinations for each vaccinator is 1,040. Heavy rain and much sickness among the vaccinators caused a decrease of over 2,000 persons operated on as compared with the preceding year. Considering how long vaccination has been practised in this zilhá—fully half a century—it is surprising that a large number of the people will not be at the trouble to get their children vaccinated. I expect Dr. Cody to show some good progress in his next report.

Kolábá collectorate.

69. The Kolábá collectorate has a population of 350,405 and an area of 1,482 square miles. There are 5 vaccinators and vaccination is carried on at the dispensaries of Alibág and Pen to a small extent. There were 8,096 persons primarily vaccinated or 23·1 per mille of population which is satisfactory. The success was 93·2. There were 109 revaccinations. The average for each vaccinator is 1575.

Násik collectorate.

70. In Násik collectorate the population is 687,353 and the area 7,179 square miles. There are 11 vaccinators, viz., 10 local fund and 1 municipal, and vaccination is carried on at 3 dispensaries. There were 15,400 persons primarily vaccinated or 22·4 per mille of population. The success was 91·6 per cent. The revaccinations numbered only 171. The progress in this zilhá has been very good and it promises to continue. The average for each vaccinator is 1386.

Khándesh collectorate.

71. The Khándesh collectorate has a population of 1,028,642 and an area of 10,162. There are 17 vaccinators, viz., 16 local fund and 1 municipal : vaccination is also practised at 3 dispensaries. There were 26,658 or 25·9 per mille of population. The success was 95·8. There were 303 revaccinations. The progress here has been very satisfactory. The average for each vaccinator is 1547.

Native states.

72. Vaccination was practised in the three native states of Janjirá, Jawár and Penth. Their population is 156,435 and the area 1,644. There are 3 vaccinators and there were a few vaccinations done at the Penth dispensary. There were 6,173 persons primarily vaccinated or 39·4 per mille of population. Vaccination has only recently been introduced into Janjirá. There is a very large proportion of the vaccinated above one year old, as might be expected. The success was 95·7. There were only 7 revaccinations. Each vaccinator averaged 2,005 which is above the average of the Western circle by 598. The progress in the last few years has been very satisfactory in these states and is a stern reflection on the obstinacy which for half a century kept vaccination out of one of them.

Progress of vaccination in Eastern Gujaráth circle.

73. What is now called the Eastern Gujaráth circle consists of the collectorates of Surat, Broach, Khedá and the sub-collectorate of Panch Maháls and of the native states of Rewá Kánthá, Mahi Kántha, Cambay, Dharmpur, Bánsdá and Sachin. The population is 3,112,490 and the area is about 25,774 square miles. In this circle there are 1 superintendent, Dr. Colah (uncovenanted), 4 assistant superintendents, 46 vaccinators, viz., 25 local fund, 3 municipal, and 18 native states: and vaccination was practised at 19 dispensaries. There were 83,417 persons primarily vaccinated

or 26·8 per mille of population. The success was 94·8. The revaccinations numbered 2,167. The average number of persons operated on by each vaccinator was 1,784.

Kheda collectorate.

74. The population of Kheda collectorate is 782,733 and the area 1,561 square miles. With the exception of the island of Bombay this is the most densely populated district in Western India. There are 9 vaccinators—8 local fund and 1 municipal, and vaccination was practised to a small extent at 5 dispensaries. There were 18,652 persons primarily vaccinated or 23·8 per mille of population. The success was 93·1. There were 781 revaccinations and the average work of each vaccinator was 2,031. I should like to see the primary vaccinations reach over 25 per mille which they might do easily in this zilha; however the progress must be considered satisfactory when compared with the general progress: doubtless small-pox protected a good many in the epidemic of the preceding year.

Panch Máháls.

75. The population of the Panch Máháls is 240,743 and the area is 1,731 square miles. There are 5 local fund vaccinators and vaccination is practised at Godhra dispensary. There were 8,336 persons primarily vaccinated or 34·6 per mille of population. The success was 96·6. There were 138 revaccinations. The average number of persons operated on by each vaccinator was 1,599. Progress here is very satisfactory.

Broach collectorate.

76. The Broach collectorate has a population of 350,322 and an area of 1,358 square miles. There are 5 vaccinators viz., 4 local fund and 1 municipal and vaccination, is practised a little at 4 dispensaries. There were 9,707 persons primarily vaccinated or 27·7 per mille of population which is very satisfactory. The success was 97·0. There were only 85 revaccinations. The average work of each vaccinator was 1,826.

Surat collectorate.

77. The Surat collectorate has a population of 607,087 and an area of 1,588 square miles. There are 9 vaccinators, that is one local fund vaccinator for each of the 8 talukas and one municipal vaccinator for the city of Surat itself. The local fund vaccinator of the Chorási táluká also vaccinates the 16 Sachin native state villages, which have a population of 17,103 so the nine vaccinators have a population of 624,190 among them, which gives an average of 69,354 to each. Mr. Hope, the Collector, wanted to reduce the number of vaccinators, but as I consider such a step very unadvisable, I declined to go up to Government with his proposal. There are 7 dispensaries at which vaccination was practised to the extent of 987 persons. There were exclusive of the Sachin villages 17,415 persons primarily vaccinated or 28·6 per mille of population. The success is 94·6. There were 930 revaccinations. The vaccinator's average is 1,928. Here the progress is very satisfactory and I think it would be a sad pity to injure it by a reduction in the number of vaccinators.

Native states in Eastern Gujaráth circle.

78. The native states are Mahi Kánthá, Rewa Kánthá, Cambay, Dharmpur, Bánsdá and Sachin. Their population is 1,131,605 and their area is about 19,536 square miles. There are 18 vaccinators and a few vaccinations are done at 2 dis-

pensaries. There were 29,307 persons primarily vaccinated or 25·8 per mille of population. The success was 94·7. There were 233 revaccinations. Vaccination in these states is in a very satisfactory condition.

Progress of vaccination in Western Gujaráth circle.

79. What is now the Western Gujaráth circle consists of the collectorate of Ahmadábád, the province of Káthewád and Pálanpur territory. The population is 3,142,153 and the area 30,246. There is a superintendent, who is at present also civil surgeon of Rájkot; but a proposal has been submitted to the Government of India to have a superintendent for this circle, who shall have no other than vaccination duties to perform. There are 3 assistant superintendents and 52 vaccinators; and vaccination is practised to a very small extent at 11 dispensaries. There were 107,529 persons primarily vaccinated or 34·2 *per mille* of population. The percentage of success was 95·6. There were 3,725 revaccinations. The average number of persons operated on by each vaccinator was 2,090. Progress is very satisfactory and is very creditable to Dr. Butler.

Ahmadábád collectorate.

80. The population of Ahmadábád collectorate is 827,754 and the area 3,841 square miles. It has 12 vaccinators—7 local fund and 5 municipal; and vaccination is practised at 6 dispensaries. There were 21,168 persons primarily vaccinated or 25·5 *per mille* of population. The success was 94·6. The revaccinations numbered 1,823. The average number of persons operated on by each vaccinator was 1,793. This is very satisfactory progress.

Pálanpur states.

81. The Pálanpur states have a population of 532,187 and an area of 10,450 square miles. There are only 7 vaccinators; there should be more on account of the great area. They vaccinated 12,255 persons or 23·0 *per mille* of population, which is satisfactory. The success is 96·3. There were only 71 revaccinations. The average number of persons operated on by each vaccinator is 1,760.

Province of Káthewád.

82. The province of Káthewád has been divided into 4 vaccine divisions, viz. the northern, western, southern and eastern. I shall treat each of these divisions as I have done the collectorates.

Northern division of Kathewad.

83. The northern division of Káthewád has a population of 472,809 and an area of 2,953 square miles. There are 7 vaccinators and they primarily vaccinated 17,434 persons and there were 64 at the Wadwán dispensary, making a total of 17,498 or 37·0 *per mille* of population. The success is 96·3. There were only 247 revaccinations. The average number of persons vaccinated by each vaccinator is 2,526. The progress here is all that can be desired.

Western division of Káthewád.

84. The western division of Kathewád contains 548,960 souls and has an area of 6,789 square miles. There are 10 vaccinators in it and vaccination was practised at 3 dispensaries. The number of persons primarily vaccinated amounted to 23,102 or 42·0 *per mille* of population;

which, I think, must be more than the birth-rate : so it cannot be maintained long, as the arrears of unprotected must soon be all worked off. The success is 93·8 per cent. and the average number of persons operated on by each vaccinator is 2,339.

Southern division of Káthewád.

85. The southern division of Káthewád contains 406,383 souls and has an area of 3,693 square miles. It has 8 vaccinators and they primarily vaccinated 16,457 persons or 40·4 per mille of population There were 116 revaccinations. Each vaccinator operated on an average on 2,072 persons. I do not think these numbers can be maintained.

Eastern division of Káthewád.

86. The eastern division of Káthewád has a population of 354,060 and an area of 2,520 square miles. There are 8 vaccinators and at one dispensary 6 persons were vaccinated. The total number of persons primarily vaccinated was 17,049 or 48·1 *per mille* of population, which must be far above the rate annually available. There were only 140 revaccinations. Each vaccinator operated on 2,148 persons on an average.

Sindh circle.

87. The province of Sindh constitutes one circle—in it is the territory of H. H. Ali Murád of Khairpur. The population of the circle is 2,300,711 and the area 52,978 square miles. This circle, though not nearly so populous as most of the other circles, is by far the largest in extent. There are 6 assistant superintendents and 50 vaccinators: and vaccination is more or less practised at 19 dispensaries in Sindh and at one in Goádar on the Mekran coast. The total number of persons primarily vaccinated is 102,108, exclusive of the 109 at Goádar and 1,087 Jodpuris and Kachís or 44·3 *per mille* of population, which is more than the birth-rate—but a great effort was made by Dr. Williams to vaccinate all the unprotected below 15 years old. The success is 97·5 per cent. There were 7,820 revaccinations, including 261 foreigners. Each vaccinator operated on 2,146 persons on an average. The province of Sindh has 3 collectorates and 2 political superintendencies, viz., the collectorates of Karáchi, Haidarábád, and Shikárpur, and the frontier districts of Upper Sindh and Thar and Párkar, besides, the native state of Kháirpur. The progress of vaccination in the Sindh circle has been very satisfactory for a number of years back.

Karáchi collectorate.

88. The collectorate of Karáchi has a population of 421,791 and an area of 14,089 square miles. There are 11 vaccinators—9 local fund and 2 municipal for the city of Karáchi, and there are 8 dispensaries at which vaccination is practised. There were 18,604 persons primarily vaccinated or 44·1 *per mille* of population. The success is 97·3 per cent. The revaccinations numbered 1,395. The average number of persons vaccinated by each vaccinator is 1,725.

Shikárpur collectorate.

89. The Shikarpur collectorate has a population of 776,227 and an area of 8,813 square miles. There are 15 vaccinators—13 local fund and 2 municipal and vaccination is carried on at 3 dispensaries. There were 34,432 persons primarily operated on or 44·3 *per mille* of popu-

lation. The success is 97·9 per cent. There are 4,005 revaccinations. The average number of persons vaccinated by each vaccinator is 2,485.

Haidarábád collectorate.

90. The Haidarábád collectorate contains 721,947 of a population and 9,052 square miles. There are 13 vaccinators—12 local fund and 1 municipal and vaccination is practised at 4 dispensaries. There were 25,120 persons primarily vaccinated or 34·7 *per mille* of population. The success is 97·6. There are 1,141 revaccinations. The average number of persons vaccinated by each vaccinator is 1,950.

Upper Sindh Frontier district.

91. The Upper Sindh Frontier district has a population of 89,985 and an area of 1,913 square miles. There are 3 vaccinators and they primarily vaccinated 5,810 or 64·5 *per mille* of population. The success is 99·2. There are 28 revaccinations. Besides, the 3 vaccinators operated on 389 Kachis from beyond our territory which bring each vaccinator's average up to 2,075.

Thar Párkar district.

92. The Thar Párkar has a population of 180,761 and an area of 12,729 square miles. There are 6 vaccinators and 4 dispensaries at which vaccination is carried on. The number of persons primarily vaccinated was 13,814 or 76·4 *per mille* of population. The success is 97·4. There were 991 revaccinations. Besides the above there were 954 persons from Jodhpur operated on. The average of each vaccinator is 2,526.

H. H. Mir Ali Murad's territory of Khairpur.

93. The Khairpur state contains 110,000 people and an area of 6,382 square miles. There are 2 vaccinators who primarily vaccinated 4,328 persons or 39·3 *per mille* of population. The success is 95·2. There were only 3 revaccinations. Each vaccinator averaged 2,165 persons.

Goádar.

94. There were 109 persons vaccinated and 1 revaccinated at the telegraph station of Goádar in Belochistán.

Vaccination in Barodá territory.

95. Vaccination is carried on in H. H. the Gaikawád's territory which has a population of 2,000,225. The Resident, Colonel Phayre, is unable to give me the area or at least any thing nearer than it is 260 kos long and 40 broad. I cannot say how much it is, but it has been roughly estimated in the returns at 20,000 square miles. There are 1 assistant superintendent and 23 vaccinators. The primary vaccinations number 27,299 or 13·6 *per mille* of population. The success is 93·5. There were 482 revaccinations. Each vaccinator on an average operated on 1,207 persons. The progress is not satisfactory, but there is some prospect of an improvement.

Kutch.

96. H. H. the Ráo of Kutch's territory has a population of 486,900 and an area of 6,500 square miles. There are 1 assistant superintendent and 11 vaccinators; 6 of whom are maintained by His Highness and 5 by the Bhayáds. There were 2,468 persons vaccinated or only 5 *per*

mille of population. The percentage of success is 93·9. There are only 8 revaccinations. Each vaccinator's average is only 225. Vaccination is very backward here but I hope it will soon improve.

Aden.

97. Aden has a population of 19,289 and an area of 12 square miles. By some mistake the Government station vaccinator had been kept on since 1871 till near the close of the year: but there is now only the municipal vaccinator who is quite able to do all the work. There were 1,145 persons vaccinated or 59·3 *per mille* of population, but there were probably a number of those vaccinated only temporary residents, such as Somalis and other Africans and perhaps also some Arabs. The percentage of success is 80. There were 120 revaccinations. Each vaccinator's average is only 632. The success ought to be much higher.

The vaccination department might assist the sanitary department.

98. The Army Sanitary Commission in reviewing my report for 1870-71, stated that "The returns show that "the superintendents of seven out of ten circles "visited and inspected 1,922 villages during "last year and nevertheless so far as their "special duties were concerned they appear to have had no function to per- "form regarding local disease causes so extremely prevalent in Indian villa- "ges and cities.

"This remark is not made with the object of taking exception to any "portion of the vaccination organization or work. The facts already given "show how efficiently this work is performed.

"The Commission are likewise too little acquainted with the local or- "ganization of these villages to take upon themselves to make any recom- "mendation on the subject. But seeing that the whole object of the vaccina- "tion organization is to check the spread of one form of epidemic disease "they would beg to suggest the question whether without in any way im- "pairing the efficiency of the organization or interfering with its proper work, "it might not render very efficient inspecting service in helping towards the "removal of local disease causes? The Commission make this suggestion be- "cause, amongst other reasons, this Bombay Vaccination Department par- "takes very much indeed of the character of what might be a most effi- "cient sanitary service for the Presidency. It shows how in principle such "a service should be organized, and it appears to be possible that the sani- "tary inspecting work might be accomplished without an agency in duplicate "which must necessarily partake very much of the character of the agency "already in existence, while adding materially to the outlay."

This was brought to the notice of this Government in Her Majesty's Secretary of State for India's letter No. 4 (Sanitary) dated India Office, London, 26th March 1872. I would beg to say that I believe the suggestion of the Army Sanitary Commission could be beneficially carried out without any considerable cost, indeed, it might be done without any additional expenditure at all. I know that it may be said that the officers of the vaccination department might devote too much of their time to sanitary matters *in general* and that vaccination *in particular* would suffer thereby: this is a danger that I do not fear, because for many years to come, in India, vac-

cination is likely to bring more credit to officers of the vaccination department than general sanitation can be expected to give them, however successful they may be as sanitists. If Government should see fit to strengthen the sanitary department by the aid of the officers of this department, the present strength of superintendents is not too great; but on the other hand if Government wish to keep the two departments apart and distinct, then, some of the circle superintendents could be spared for other duties. With the assistant superintendents working so well as they have done, I think, we might extend their functions and place the whole presidency under the superintendence of 5 medical officers; that is to say, we should have only 5 circles, viz:—

1. Presidency.—Island of Bombay.

2. Dekhan.—All, or nearly all, the districts above the ghâts.

3. Konkan.—All the districts below the ghâts.

4. Gujaráth.—All Gujaráth including the present Eastern and Western Gujaráth circles.

5. Sindh.—The province of Sindh.

The superintendent general might hold charge of one of these circles and there would then be only 4 instead of 7 superintendents. Something of this kind must be done if we wish to reduce our administration charges and keep the cost of vaccination as low, or nearly as low, as in other provinces in India. I think it is quite feasible to work the department with 4 superintendents without impairing the efficiency of it. On the other hand, as I said before, if Government wish to strengthen the sanitary department by the aid of the officers in the vaccination department, the strength is not any too great and our organization is suitable.

J. PINKERTON, M.D., Surgeon Major,
Superintendent General of Vaccination,
Bombay Presidency.

Bombay, 6th June 1874.

EXTRACTS

FROM THE

REPORTS OF SUPERINTENDENTS OF CIRCLES.

PRESIDENCY CIRCLE.

Superintendent.—Assistant Surgeon Anantá Chandrolá, G.G.M.C.

Establishment.—11 Municipal vaccinators.

Population, 644,405. Total cost Rs. 10,676-1-9. Average cost of each successful operation 1 rupee 1 anna and 3 pies.

Establishment.	Years.	Total Number of persons vaccinated and re-vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those "unknown" from the total.	
			Increase.	Decrease.		In primary vaccination.	In re-vaccination.
Municipal	1872-73	16,415	.....	.....	13,055	89·0	44·1
	1873-74	13,907	.....	2,508	9,897	87·9	53·5

Operations of the year.

During the year under report, there were 10,027 persons primarily vaccinated, and among these there were 271 secondary operations. There were 3,880 persons re-vaccinated, among whom there were 69 secondary operations. Compared with the year preceding, there has been a total decrease of 2,508. The

Decrease.

decrease among the primarily vaccinated, however, is considerably greater—amounting to 4,505. There is an increase in the re-vaccinations to the extent of 1,997. Very considerable as the decrease is in the primarily vaccinated, the event is not at all strange, and was quite anticipated. Epidemics of small-pox, some of them extremely virulent, all very extensive, rapidly succeeding each other, over a period of three years, could not but have protected a great many in the natural way. During the years 1871-72 and 1872-73, besides, unprecedentedly large numbers were vaccinated; and the number of children, of sufficiently advanced age, available for operations was considerably less last year than there usually is. There can be no denying the fact, however, that, even now, thousands of infants still remain unprotected. These unprotected children belong, for the most part, to the middle and upper classes of the community generally, and to the Mahomedan and Gujaráthi baniá portion particularly. The one powerful and telling incentive to a recourse to vaccination—the prevalence of small-pox of some virulence and extent—being absent, these people would neither bring their children to the public stations to

be vaccinated, nor would they allow us to vaccinate them even at their own doors. Whenever and wherever we could, we did not hesitate to vaccinate little infants, hardly six or eight weeks old; and never in these cases was there any thing untoward met with. As a matter of fact, with all these drawbacks, our work of the year under report, can bear comparison with the annual work for the last ten or twelve years, excepting, of course, the years 1871-72 and 1872-73, which were in every way exceptional, on account of the terrible prevalence of small-pox.

Sex. 2. Of the 10,027 primarily vaccinated, 5,515 were males, and 4,512 females, or respectively 55 and 45 per cent. 844 were Christians, 6,394 Hindús, 1,256 Mahomedans, 665 Pársís, and 868 of other castes—comprising low caste Hindús and Jews—giving percentages of 8·4, 63·8, 12·5, 6·6, and 8·7. 6,545 were under, and 3,482 above, one year of age, the percentages being 65·3 and 34·7.

Caste.

Age.

A cheering feature of the operations of the present year is the large number of children vaccinated under one year old—almost double the number of children above that age—indeed the number of children between four weeks and six months amounted to 3,306. In the whole history of the Presidency vaccination circle, the year under report, and the one preceding it, are the only years in which the number of children vaccinated under one year of age exceeded the number above that age. The following figures show the ages of the vaccinated:—

Ages.	Under 3 months.	Between 3 and 6 months.	Between 6 and 12 months.	Between 12 and 24 months.	Between 2 and 4 years.	Between 4 and 6 years.	Between 6 and 9 years.	Between 9 and 13 years.	Between 13 and 24 years.	24 years and upwards.	Total vaccinated.		Grand Total.
											Under 1 year.	Above 1 year.	
Persons primarily vaccinated	1,301	2,005	3,239	1,449	1,547	198	85	67	86	50	6,545	3,482	10,027

3. Of the 10,298 primary operations, 8,665 were successful or 87·9 per cent. 1,187 were unsuccessful and in 446 the result could not be ascertained. Of the 3,949 re-vaccinations, 1,232 were successful, 1,070 were unsuccessful, and in 1,647 the result is unknown. The percentage of success was 53·5, which is considerably higher than that of the preceding year which was 44·1.

Result.

4. Our chief source of lymph is from the heifer; and we had, for the most part, a large supply of it of an excellent quality. During the months of July and August, however, some seven heifers got affected with fever—five after inoculation—and our supply of animal-lymph failed for a time. An attempt was made to carry on the operations with human-lymph procured in tubes from the other circles. Unfortunately the greatest number of them failed in my hands; thus considerably reducing the percentage of our success. Fresh supplies of preserved animal-lymph were obtained from Dr. Warlomont of Brussels which fortunately proved successful, and our animal-lymph was once more re-established in its natural purity, genuineness

Lymph.

and efficiency. Our vesicles, for the most part, when not disturbed, were of the true Jennerian type; and the resulting cicatrices deep, well-marked, and foveated.

Animal Vaccination.

Our animal vaccination continues satisfactory. In all, 205 heifers were inoculated. In nine, only, did the operation fail. The following table shows the number of heifers inoculated in each of the twelve months, with the result of the operation :—

	April 1873.	May.	June.	July.	August.	September.	October.	November.	December.	January 1874.	February.	March.	Total.
Heifers inoculated	23	15	11	9	10	9	13	21	27	23	21	23	205
Operation successful in	23	15	10	6	8	8	13	20	27	22	21	23	196
„ failed in	...	...	1	3	2	1	...	1	...	1	...	...	9

8,285 primary vaccinations, and most of the re-vaccinations, were performed with animal-lymph; and of the former 7,130 proved successful, and only 802 unsuccessful—giving a percentage of 89·8 of success.

Small-pox.

5. The epidemic that was prevailing at the commencement of 1873, gradually declined, and the number of deaths from small-pox became smaller and smaller, till in September there was none. The disease was, however, never quite absent; and it again began to make head from the month of November. This table shows the number of deaths from small-pox during the different months of the year :—

Months.	April 1873.	May.	June.	July.	August.	September.	October.	November.	December.	January 1874.	February.	March.	Total.
Deaths from small-pox	160	99	36	14	5	...	1	4	5	7	25	49	405

Small-pox is now prevalent in all parts of the island, but it is very mild; having, no doubt, spent itself in a very great degree during the epidemics of 1871-72 and 1872-73. The total number of deaths from small-pox, during the year, amounted to 405, in the preceding year the number was 1,637. The following table shows the deaths from small-pox, in the different localities, arranged according to sex, caste, and age.

Registration districts.	Sex.		Caste.												Age.											Previously vaccinated.	Not previously vaccinated.	Unknown.
	Male.	Female.	Buddhists Jains.	Brahmins.	Lingayats Bhatias.	Hindus other Castes.	Hindu Out Castes.	Musalmans.	Parsis.	Jews.	Native Christians.	Europeans.	Indo-Europeans.	Negro Africans.	Birth to 15 days.	15 to 30 days.	1 to 3 months.	3 to 6 months.	6 to 12 months.	12 to 23 months.	2 to 4 years.	5 to 6 years.	7 to 9 years.	10 to 13 years.	14 to 24 years.	24 years and upwards.			
Kolábá	..	1	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	1	..
Fort	8	7	2	..	1	6	..	..	5	..	..	1	..	..	..	..	..	2	3	4	2	2	2	1	1	1	9	5
Esplanade	1	..	..	..	..	..	1	..	..	..	..	..	..	..	..	..	..	..	1	..	..	..	..	..	..	..	1	..
Market	21	22	2	4	1	25	1	6	3	..	1	..	..	..	..	..	..	7	12	2	12	2	5	1	2	..	2	34	7
Mándví	10	18	6	2	2	16	1	1	..	..	..	..	..	..	..	..	..	5	7	6	5	2	3	..	..	..	..	26	2
Chakhlá	18	8	2	..	..	8	1	12	3	..	..	..	..	..	..	..	..	3	9	5	6	..	..	..	1	2	1	20	5
Umbarkhádi	10	23	..	1	..	7	..	22	..	..	1	..	..	2	..	1	..	..	14	5	8	1	..	..	1	3	..	23	10
Dongarí	16	9	..	..	..	22	..	2	..	1	..	..	..	..	..	..	1	3	9	..	7	4	..	..	..	1	2	17	6
Dhobi Taláo	22	18	2	..	..	20	2	2	9	..	5	..	..	..	..	..	2	2	15	6	8	2	..	1	..	4	..	31	9
Phanaswádi	4	3	..	1	..	6	..	..	..	..	..	..	..	..	..	..	1	..	2	1	2	..	..	..	1	..	1	5	1
Bhuleshwar	9	6	5	..	..	7	..	3	..	..	..	..	..	..	..	..	1	1	4	..	4	2	..	1	1	1	..	13	2
Khárá Taláo	16	12	..	..	..	7	2	17	..	..	2	..	..	..	..	..	1	4	10	4	7	..	..	..	..	2	2	13	13
Kumbhár Wádá	3	2	..	..	..	4	1	..	..	..	..	..	..	..	..	..	..	..	3	1	1	..	..	..	..	..	..	4	1
Khetwádí	10	7	..	..	..	9	3	2	3	..	..	..	..	..	..	..	1	2	2	..	6	2	..	1	2	1	3	10	4
Girgáum	10	4	..	3	..	10	..	..	..	..	1	..	..	..	..	..	..	1	6	1	3	1	..	..	1	1	..	11	3
Chowpatí	1	1	..	..	..	1	1	..	..	..	..	..	..	..	..	..	..	1	..	..	..	1	..	..	..	..	2	..	..
Wálkéshwar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Mahalakshumi	5	3	..	..	..	8	..	..	..	..	..	..	..	..	..	..	1	1	3	..	..	1	..	..	1	1	2	6	..
Mázagáon	10	9	..	..	..	6	..	3	3	..	7	..	..	..	..	..	..	2	4	2	4	..	1	2	1	3	1	5	13
Tád Wádi	3	1	..	..	..	2	..	..	..	..	2	..	..	..	..	..	..	1	1	..	..	1	..	1	..	..	1	..	3
Kámatipura	13	11	..	1	..	12	7	4	..	..	..	..	..	..	..	..	..	..	11	..	5	5	1	1	1	..	..	21	3
Byculla	5	6	..	..	..	7	1	3	..	..	..	..	..	..	..	..	..	..	4	..	5	1	..	1	..	..	1	10	..
Parel	5	2	..	..	..	7	..	..	..	..	..	..	..	..	..	1	1	..	2	1	2	..	..	..	..	..	..	4	3
Shiwrí	5	..	..	..	..	4	..	..	..	..	1	..	..	..	..	..	..	1	2	1	..	..	1	..	..	..	..	..	5
Sion	7	1	..	..	..	6	..	..	..	..	2	..	..	..	..	..	..	1	3	..	2	2	..	..	..	..	..	2	6
Máhim	6	6	..	..	..	9	..	1	..	..	2	..	..	..	..	1	..	..	4	..	5	..	1	..	1	..	..	2	10
Warlí	4	3	..	..	..	6	..	..	..	..	1	..	..	..	..	..	..	..	3	..	3	..	1	..	..	..	..	3	4
Total	222	183	19	12	4	215	22	78	26	1	25	1	..	2	..	1	10	38	135	39	97	28	15	9	13	20	19	271	115

Only 19 deaths were reported to have occurred in persons previously vaccinated. On enquiry, however, three or four of the 19 were found not to have had small-pox at all, but had died from fever. In three or four, small-pox came on simultaneously with vaccination, and ultimately proved fatal, of course, the patients must have been incubating the small-pox before they were vaccinated. Some were grown up people, and natives of other places; and must have been vaccinated, if at all, out of Bombay. In two only, did we find the names entered in our register; and in both these the operation is reported as successful—two vesicles in one and three in the other—these boys lived in the same house, were both vaccinated on the 20th January 1873, some three months before their death, and both became attacked with small-pox almost at the same time.

Death from small-pox after vaccination.

6. One vaccinator—Madhowrao Vitthal—was discharged in the month of December, for incapacity to carry on the duties of a vaccinator; and with two exceptions the other vaccinators conducted themselves well.

Conduct of vaccinators.

7. Most of the operations are performed by the superintendent and head vaccinator at the public stations, and consequently no definite average can be drawn of the work of the vaccinators.

Average work of vaccinators.

8. There is nothing beyond apathy, improvidence, procrastination, a little carelessness and negligence, and a false sense of tenderness for the little ones, which makes the parents think any age below 18 or 24 months as too tender

Obstructions to spread of vaccination.

for the operation ; and in some instances a fear of offending the dreaded " Devi "* when actually present, or the fear of having to undergo certain trivial expenses which vanity usually prompts them to make,—nothing beyond these seriously obstructs the working of the vaccine establishment in Bombay ; but, too often, these are more than sufficient to allow small-pox to spread at the cost of valuable lives ; and nothing short of legal compulsion can, in my opinion, alter this state of things. An Act of the Legislature rendering vaccination compulsory is much required in this city, and can alone remove these obstructions.

Progress of the vaccinia.

9. No irregularity in the progress of the vaccine disease, nor any ill effects beyond an ulcerative action now and then, set up at the seat of the vesicles, in scrofulous and weakly children, which heal tardily, have come under my observation. I have very strong reasons to believe that this ulcerative action is often, if not always, the result of the scratching or irritation of the vesicles. The introduction of any other disease but cow-pox must be quite out of the question, at least in those that are vaccinated with animal-lymph. In those comparatively few that were vaccinated with lymph from the human subject also nothing of the kind was observed.

No disease other than the cow-pox observed.

Protective influence of vaccination.

10. Vaccination continues to keep up its character of a prophylactic against small-pox, in Bombay. No deaths from small-pox occurring in persons known to be protected by vaccination has come under my observation ; nor have I heard of any except the two cases already mentioned.

---

* Goddess of small-pox.

CENTRAL CIRCLE.

Superintendent.—Surgeon Major P. S. Turnbull, M.D.

Acting Superintendents.—Surgeons J. Robb, M.B., and W. R. Gordon, M.B.

Establishment.—6 Assistant superintendents, 2 clerks, 48 vaccinators under local funds, 12 under municipalities, and 5 under native states. Total 65 vaccinators and 21 dispensaries.

Population 4,828,850. Total cost Rs. 34,133-2-10. Average cost of each successful case 5 annas and 2 pies.

Establishment.	Years.	Total number of persons vaccinated and re-vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding, "those unknown" from the total.	
			Increase.	Decrease.		In primary vaccination.	In re-vaccination.
Local Funds	1872-73	97,154	...	...	86,643	94·9	63·3
	1873-74	99,126	1,972	...	90,475	95·9	63·3
Municipalities	1872-73	13,458	...	...	10,306	92·2	37·5
	1873-74	12,722	...	736	10,242	94·7	20·0
Native States	1872-73	5,097	...	...	4,412	93·2	100·0
	1873-74	5,492	395	...	4,874	95·7	33·3
Dispensaries	1872-73	3,851	...	...	3,126	91·4	31·3
	1873-74	4,201	350	...	3,575	91·6	51·7

From the above table it will be observed that there is an increase in all the establishments, except the municipal. In the local funds and native states, I consider this due, in a great measure, to the careful supervision, and constant inspection of the vaccinators' work by the assistant superintendents. The increase at dispensaries is no doubt due to the stringent orders by the Surgeon General, which have been issued to the medical subordinates in charge of dispensaries. Three new dispensaries have been opened during the year, but at these there has not been much vaccination done as yet. At two of them 48 children were vaccinated and at the third none. At the Wái dispensary there is a decrease of no fewer than 441, for which I am unable to offer any satisfactory explanation. The municipal establishment shows a decrease of 736. This has occurred from the abolition of the municipal vaccinatorships of Khánápúr and Bárámatí. But it is satisfactory to observe that the number successfully vaccinated is only 64 less than the previous year. Over the whole circle there is an increase of 1,981 vaccinations.

Increase.
Decrease.

2. The average number of persons vaccinated by each vaccinator exceeds that of the preceding year by 78. The average number vaccinated by each local fund vaccinator was 2,065, by each municipal vaccinator 1,060, and by each native state's vaccinator 1,098.

Average operations per man.

3. The following table will show the percentage of sex, caste, age and success of those primarily vaccinated, and percentage of success of those re-vaccinated as compared with 1872-73 :—

Percentage of sex, caste, age and success.

Year.	Sex.		Caste.					Age.		Percentage of success.	
	Male.	Female.	Christian.	Hindú.	Musalman.	Pársi.	Other Castes.	Under one year.	Above one year.	In primary vaccination.	In re-vaccination.
1873-74	51·2	48·8	·38	84·5	4·5	·02	10·6	37·8	62·2	95·8	63·0
1872-73	51·5	48·5	·18	86·2	5·1	·01	8·5	28·6	71·4	94·8	62·5

As far as regards sex and caste, there is very little difference from the preceding year, but it will be observed that there is the very satisfactory increase of 9·2 per cent. of infantile vaccinations, and that the percentage of success in primary vaccination is 1·3 above that of 1872-73.

Lymph, vesicles and cicatrices.

4. The lymph in use throughout the year has been reported to be good and active, the vesicles large and characteristic, and the cicatrices deep and foveated.

Inspection of vaccinators' work.

5. The vaccinators' work has been tested by the superintendent and assistant superintendents calling over the names of 78,006 children from the vaccinators' registers, of these 95·6 per cent. were returned by the vaccinators as successful vaccinations, but on inspection only 92·2 per cent. were found successful. On examining this number in detail I find that 75·5 per cent. were found to bear good vesicles or cicatrices, 13·2 middling and 3·5 bad.

6. As I have only been in charge of the circle from 8th March I have confined my remarks to these few words which are based on the figures of the present as compared with the previous year.*

As returns for ten months only of the year have been received, it is not possible for me to state exactly the results of the year's operations. I shall, therefore, in the following report confine myself to the period from the 1st April 1873 to the 1st February 1874.*

2. I assumed charge of the circle from Surgeon Robb on the 12th August last, after I was relieved of the Acting Superintendent Generalship, on the return of Dr. Pinkerton from furlough, and am therefore personally acquainted with the working of the circle during the seven months preceding the 8th March 1873, the date of my giving over charge to Surgeon Gordon, and of my proceeding on privilege leave for three months.

3. Government were pleased, in their Resolution No. 2783 of the 7th August 1873, to approve of a scheme which I submitted when I was Acting Superintendent General for the re-distribution of the vaccine circles and ordered that the re-distribution should take effect from the 1st November 1873. This was done and as far as this circle is concerned, with the following result. Khándesh and Násik collectorates with the Penth state were transferred from the Central

* Dr. Turnbull took three months' privilege leave on 8th March 1874, his report is therefore for ten months of the year. Dr. Gordon compiled the annual returns and wrote the preceding part of this Circle's report.

to the Western circle and the collectorate of Ratnágirí from the Western to the Central circle. The following statement shows the composition, area, &c., of the Central circle before and after the completion of the re-distribution :—

Prior to re-distribution.				After re-distribution.			
Zilhas or States.	No. of vaccinators.	Area in square miles.	Population.	Zilhas or States.	No. of vaccinators.	Area in Square Miles.	Population.
Pooná.	13	5,095	878,785	Poona	12	5,095	878,785
Ahmadnagar	12	6,647	769,955	Ahmadnagar	12	6,647	769,955
Nasik	11	7,179	687,353	Sholapur	9	3,925	662,986
Khandesh	17	10,162	1,028,642	Satara	16	5,378	1,116,050
Sholapur	9	3,925	662,986	Ratnagiri	11	3,789	1,019,136
Satara	17	5,378	1,116,050	Akalkot	1	498	81,068
Penth state	1	960	47,033	Bhor	1	875	111,689
Alkalkot do.	1	498	81,068	Atpadi	1	118	58,980
Bhor do.	1	875	111,689	Phaltan	1	561	59,536
Atpadi do.	1	118	58,980	Jat	1	770	70,665
Phaltan do.	1	561	59,536				
Jat do.	1	770	70,665				
	85	42,168	5,572,742		65	27,656	4,828,850

Thus it will be seen that this circle, which was formerly much too large, has been very considerably reduced and at the same time made more compact—that it now consists of the Poona, Nagar, Sholápur, Sátárá, and Ratnágirí collectorates and the native states of Akalkot, Bhor, Atpadi, Phaltan and Jat. It has an area of 27,656 square miles and a population of 4,828,850. In it are employed 1 superintendent, 6 assistant superintendents, 2 clerks and 65 vaccinators. In addition the superintendent has the supervision, as far as vaccination is concerned, of the 21 dispensaries situated within the circle.

4. During the ten months of the current year, 94,632 persons have been vaccinated by the itinerant establishment and 3,141 by dispensary medical officers —total 97,773. In the twelve months of the preceding year the numbers were respectively 115,709 and 3,851—total 119,560. As the returns for February and March are not yet received, it is impossible to tell whether there will be an increase or a decrease in the year taken as a whole. But judging from the weekly returns received up to date of giving over charge, I think the total will not be short of that of the preceding year.* A few months ago I was very apprehensive that the result of the year's operations would compare unfavorably with its predecessor. My reasons for so thinking were the very general prevalence of small-pox, especially in the collectorates of Ratnágirí and Sátárá during the year 1872-73 and to the very great exertions made to overcome and circumscribe the disease—resulting in a large increase of operations, which I concluded must very greatly diminish the number of subjects available for vaccination in the year under under report.

Then again the number of operators has been reduced from 67 to 65 by the abolition of the municipal vaccinatorships of Khánápur (Satará) and Bárámatí (Pooná). The former was abolished from want of funds and the latter on the institution of a charitable dispensary. So that should there be any decrease these reductions would fully account for it. That the men, under the immediate supervision of the assistant superintendents, have worked well I can fully testify.

5. When the number of operations performed by individual vaccinators is examined, great variety is observed, due in some cases to greater zeal, greater

* There is an increase of 1,981.

natural activity and to an easier worked district or the converse. As an instance of a good and active vaccinator doing, comparatively, a small number of operations than in previous years, I may mention the man employed in the Wáí táluká, Sátárá zilhá, who has vaccinated only 1,428 persons or little more than half the number vaccinated in the previous year and certainly not half the average of a series of years. Small-pox had prevailed to a great extent during the previous year and had diminished the number of unprotected so very much that, in a considerable number of villages no subjects remained for operation. The cause and origin of this outbreak of small-pox was clearly the inoculator. At least two men were traced by the vaccinator and in one village the pátil had actually had his children inoculated. These matters were referred to the magistrate of Sátárá but no reply has yet been received.

Sex.

6. Taking the returns of the past ten months, I find that 51·3 per cent. of the total vaccinated are males and 48·7 per cent. are females—*i.e.*, a difference of 2·6 per cent in favor of males or very nearly the same as in the preceding year. In the matter of sex I believe these returns are very reliable—not more certainly than one mistake per thousand. There appears to me to be very little if any prejudice with regard to the vaccination of either sex, but whether the proportion of the sexes vaccinated, agrees with that of the sexes, born I am unable to say, not having any reliable statistics of the district to refer to.

Caste.

7. In the Central circle all castes more or less avail themselves of the services of the vaccinator but lingáyat wánís and bráhmins are the most difficult to deal with. The former are in great force in the neighbourhood of Bársi and Sholápur and during the past month I have made some proposals for measures to induce them to submit their children to vaccination. Of these proposals I shall say more in a future paragraph.

Age.

8. Small-pox, it is well known, attacks, generally, young children, more especially children under two years of age. It is therefore of the greatest importance that infants should be vaccinated early; before they are exposed to the noxious influence of the small-pox virus. This subject has constantly engaged my attention and I am happy to say that my subordinates have generally done all in their power to carry out my directions. Their efforts have I think been wonderfully successful and have resulted in a large increase in the number vaccinated under one year of age. This will be best seen when the returns of the past ten years are compared with the returns of the current year. But even those of the present compared with the previous year show an increase of no less than 9 per cent—the numbers being respectively 37·5 and 28·5 per cent. Nine per cent. on 94,632 shows, I think, a very satisfactory increase indeed and were the birth registers kept correctly the increase would be still greater. But I regret to say that these registers are still far from perfect—some, nay many of them, showing little more than 20 per thousand, little more perhaps than one-half of the number born. But notwithstanding this drawback birth registers are, and will be, of the very greatest use and assistance to the members of the vaccination department; and but for the more regular and extended use of them I think the increase shown in the present year would have been much less. The increase is, I think, principally due, however, to greater completeness of the vaccine arrangements, and consequently to talukas or villages being gone over more frequently. Most tálukás having during the past two years been gone over, the number of children above one year of age, available for vaccination has been much reduced and in future this will be still more so. I am of opinion that with the present system and establishment, 50 per cent. of the children vaccinated should be under the age of twelve months. As to the correctness of the figures, I believe them to be substantially correct and to be very creditable to the vaccinators generally.

9. With regard to the result of the operations, I am glad to say, the returns are very fairly correct and that the percentage of success is higher than in the preceding year. In the majority of cases I have found the returns of the vaccinators very exact, but in a few, as will always be the case, I must say I had great reasons to be dissatisfied and in none more so than in the case of the vaccinator of Siogáon táluká, Ahmadnagar collectorate, and that of Sirúr in Poona. The latter was the worst. The precentage of success in primary vaccinations as recorded by the vaccinators is 95·6 or 1·3 per cent. over the preceding year. With regard to the second and third columns under the head of "Results" I found some vaccinators very careless—entering cases as "unsuccessful" and omitting on the 8th day to vaccinate them a second time, and putting down cases as "unknown" without thorough investigation. I issued strict orders with regard to these points and at the same time informed vaccinators that I expected they would attend to them most carefully, and should they not or through carelessness should mistakes be made, I would return their monthly nominal roll for correction "service bearing" and that the amount of postage paid would be considered in the light of a fine. This had the best effect. In a few cases returns had to be sent back for correction or for attention to points indicated; but such cases are now comparatively few. This mode of punishment besides being the most just, appears to me to have a better effect than deducting an amount even ten times greater from their pay in the pay abstract, for in the one they have actually with their own hands to pay the fine in hard cash whereas in the other they have never received the money and consequently do not realize the punishment so readily. To ascertain that in the matter of the cases recorded as "unsuccessful" and "unknown" the vaccinator had done all he could to persuade the people to have the former operated on again, and in the latter to find out the result, I prepared and issued a form along with the circular showing under the signature of the village officers that the vaccinator had visited the village at least twice for these purposes. The returns of the past three months will show what the results of these measures were and how completely the objects were attained.

Success.

10. In my letters Nos. 566 and 568 of 1873-74, I made some proposals for the extension of vaccination in the Poona and Sholapur collectorates and in letter No. 560 in the Bhor State also. Here I need only recapitulate them. They consist of—

Suggestions for promoting the spread of vaccination.

(a) Four additional local fund vaccinators for the collectorate of Pooná, for duty in the large tálukás of Haweli, Khed, Juner and Bhimthadi.

(c) An additional vaccinator for the Sholápur táluká, Sholápur collectorate; and

(c) The introduction of animal vaccination into the towns of Sholápur and Bársi.

An examination of the area and population of the tálukas named will at once show that one man is quite insufficient to overtake any one of them within three years, and if the work is done properly, if each village is finished completely before leaving it, I do not think that one man could finish either of the above named tálukás in that space of time. The Haweli táluká for instance has a population of 1,55,082 exclusive of Poona City, and though the vaccinator operates on three thousand persons yearly, yet it has taken him nearly four years to overtake the táluká once. That the Bhor state requires a second vaccinator is obvious and Government in their resolution on last year's annual report on vaccination approved of my recommendation to that effect. I believe a second man will be appointed from the 1st April 1874.

With regard to animal vaccination in such places as Sholápur and Bársi, I am of opinion that until it is introduced it will be difficult to overcome the prejudices of the lingayat wanis who are in great force in these and other towns.

In Bársi, for instance, in a population of 18,560 about 8,000 belong to the above caste. The same way with Sholápur. Of a population of 53,403 nearly 15,000 are lingayat wanis, a people whose principal objection to vaccination, as far as I can ascertain, is caused by the dread of having to allow lymph to be taken from the arms of their children. The introduction of animal vaccination would completely overcome this objection.

Irregularities in the progress of the vaccine disease.

11. In the town of Mahálungi in the Khed táluká, Pooná collectorate, a patil reported that his child had not only been vaccinated by force, but that it was very ill in consequence. Enquiry was at once made. Mr. Trimbak Anant, the assistant superintendent, proceeded to the spot and with the assistance of a panchayat investigated the case and found that the report was a tissue of misstatements. The child no doubt had been vaccinated, but with the consent of the mother. The disease had run its course normally and when seen (only a short time after the report was made) the child was in sound health and did not appear to have suffered in any unusual way. The whole matter was brought to the notice of the magistrate, Mr. Bell, who I believe fined the man. Such cases are not of frequent occurrence, but in every case strict investigation should be made and the results recorded. Mr. Trimbakráo in this case performed the duty in a very intelligent and satisfactory manner. Except badly or prematurely formed vesicles I have not seen anything unusual in their character during the past year. I have not seen nor heard of a single case in which disease other than cow-pox was introduced into the system through vaccination.

Small-pox vaccination.

12. Though during the past four months I have tested the work of at least 30 vaccinators and called over the names of nearly 5,000 children, as they stood on the register, I have failed to discover a single death of a child from small-pox after successful vaccination. In a case here and there I have seen a child who had suffered from small-pox after vaccination even when the cicatrices were distinct and regular. But such cases are "few and far between" and in all the small-pox disease had been mild.

Small-pox.

13. The circle, as far as my information goes, has been almost entirely free from small-pox during the past year. In Ratnágiri one or two of the vaccinators reported a few cases but of very little importance. The other collectorates appear to have been comparatively free from the disease.

Inoculation.

14. Except from the Wái táluká, Sátárá zilha, no reports of the presence of the inoculator have been received. In the western part of the Wái district the inoculator had been at work. In nearly every village the vaccinator visited, he found numbers of children who had been inoculated, and in one case the pátil of the village had his own children inoculated and acknowledged the fact in writing. The reports of the vaccinator show that two men had been at work. Their names with the facts collected were referred to the magistrate of the district for inquiry and what prohibitory or other steps he might think fit. The subject is yet under investigation I believe.

Conduct of the vaccinators and assistant superintendents.

15. Though I cannot report the conduct of the vaccinators as every thing that can be desired—that would be too much to expect—yet I must say that they have generally behaved extremely well. There have been a few exceptions to the general rule and in one case I was obliged to ask the removal of one from the service. There are six assistant superintendents in this circle; one of them joined his appointment on the 23rd February and was under instruction in the office of the Superintendent up till the 2nd March. Under Government Resolution No. 2783, of 7th August 1873, he was appointed to the Sátárá collec-

torate. The remaining five have all been on duty throughout the year and have generally performed their duties most satisfactorily. For zeal, intelligence, and tact Messrs. Balkrishna Rájárám, Trimbak Anant, and Ràmji Khanderao have been distinguished and have in a very satisfactory manner seconded my efforts, and carried out my orders. They have all worked hard and done what they could to promote good vaccination and to extend the prophylactic wherever it was found backward or deficient. In testing returns, preserving and distributing good lymph and generally in raising the status of the vaccinators they have performed their duties in a very praiseworthy manner. It was at first thought that sudden elevation from small to comparatively large pay might tend to make these men rather harsh in their bearing towards those under them. That such has not been the case in any of the assistant superintendents of this circle I feel perfectly sure. They have acted in all cases with patience, kindness, and forbearance, yet with firmness. They have been thoroughly truthful, honest and straightforward; not scrupling to bring to notice even the smallest mistakes of the vaccinators, but not forgetting to mention their good qualities also. I have had frequent opportunities of personally testing the truthfulness and exactness of their reports and have never found them otherwise than correct.

Tour.

16. On the 1st April 1873 the office was in Khándesh and thence Dr. Robb proceeded through the Násik district in the following month. In October I examined a few villages in Haweli táluká and on the 3rd November proceeded through Haweli and Sirur tálukás to the Ahmadnágar district in company with the Superintendent General. Work of the Haweli vaccinator excellent, that of the Sirur vaccinator the very reverse. From Sirur we went through the Párner táluká to Nagar. In Párner the work was good but very small in amount, and as a large number of villages remained unvisited and the vaccinator was and had been conducting himself very irregularly, I asked the Superintendent General to remove him, which was done and the municipal vaccinator of Ahmadnagar appointed in his place. At Nagar we inspected the work of the táluká and municipal vaccinators and found it very satisfactory. From Nagar we went to the Newasa taluka and thence to the Siogaon taluka. In the latter vaccination was not progressing satisfactorily and as the vaccinator wished to resign his appointment, he was discharged. In Newásá Vithu Bhikáji was doing very fair work but not going over his district so regularly as is desirable. This fault is not a very rare one and the wonder is that it is not more frequent, for the men are without maps. Every vaccinator should be supplied with a map of his district. Without them they cannot be expected to go over the villages regularly. From Newásá I proceeded through the tálukás of Rahuri, Kopargaon and Sangamner. In Rahuri everything was satisfactory. When in this táluká I tested lymph received from England through the Superintendent General of Vaccination. It resulted successfully and was propagated and distributed in tubes throughout the circle and to several medical officers beyond the circle limits. In Kopargaon taluka matters were not so satisfactory, but the fault was not entirely the vaccinator's. In many villages the village officers (I know from personal experience) give less assistance than elsewhere. The work of the vaccinator was middling and his lymph inferior. He was at once ordered to discontinue the latter and was supplied afresh from the Rahuri táluká. In Sangamner táluká the vaccinator was actively and successfully pursuing his duties, but had difficulties to contend with —not the least being the absence of kulkarnis from their villages, for these men in this táluká seldom ever live in the villages of which they are kulkarnis. The town and dispensary of Sangamner were next inspected and though here arrangements should be best, they were worst. For want of intelligence I have seldom met the equal of the kulkarni of Sangamner. At the dispensary very little vaccination had been done by the former hospital assistant and as for the one now in charge he, until my visit, had never in his life vaccinated a single child. I reported the matter to the Superintendent General and suggested that assistant superintendents of vaccination should be directed to inspect vaccination at dis-

pensaries and report the result for the information of the superintendent. The Surgeon General Indian Medical Department has since issued instructions on this point. From Sangamner I proceeded to Narayangaon in the Juner táluká, which has always been the worst vaccinated district in this circle notwithstanding the waste of much valuable time in almost vain endeavours to overcome the prejudices of the people.

In the Juner táluká I visited 16 villages and personally explained the objects and benefits of vaccination to the village officers and people. I also visited and inspected the town and dispensary of Juner. Vaccination had been well kept up by the native doctor in charge, Mr. Babaji Jadhao. From Juner I went to the Khed táluká inspecting the work of the local fund and municipal vaccinators. The former was well done but the latter was only fairly so. However he has many difficulties to contend with, specially in the towns of Khed and Penth. From Khed I went to Madhe and Karmala tálukás where I found the work moderately satisfactory. Thence I went to Bársi, examined the dispensary, the work of the municipal vaccinator and had an interview with the members of the municipal committee to consider the best means of promoting vaccination among certain classes of the people who have hitherto not accepted its benefits. The lingáyat wanis, of whom there are 8,000 in Barsi, are very difficult to manage. They object to vaccination but more especially to allowing lymph to be taken from the vaccinated child's arm. One member of the municipal committee himself a lingayat wani informed me that this was the principal objection his fellow-casteman had to the operation; that he thought they had no strong or deep-rooted objection to it otherwise and that were this difficulty removed he thought many would submit their children for vaccination. I suggested the introduction of animal vaccination as a means of meeting the difficulty and proposed to do so provided the municipality would defray the extra expense. I explained very fully the process and its advantages and after dispelling their imaginary fears as to pain inflicted on the calf, they agreed unanimously to bring the matter before the next general meeting of the municipal committee, and they thought no difficulty would be experienced in providing the funds. From Bársi I went to Sholápur and inspected the work of the municipal vaccinator and the charitable dispensary. Both were satisfactory; but here, as at Barsi, the lingayat wanis muster in large number—there being no less than 15,000 in the town of Sholapur. I had a long conversation with the mamledar regarding vaccination, but more especially the vaccination of certain classes. He informed me that he did not think there would be any difficulty in introducing animal vaccination. From Sholapur I proceeded to Karjat táluká, in Ahmadnagar collectorate, where work was being satisfactorily carried on. Thence I went to Bárámati inspecting the work of the Indápur táluká vaccinator *en route* as also the dispensary of Baramati. The former was good, but at Bárámati I found the officer in charge of the dispensary had never vaccinated a child in his life and was unable to do so. Leaving Baramati I entered the Sátára collectorate and next inspected the work of the vaccinator employed in the Malsiras taluka, the Phaltan state, the Wai táluká, and the native State of Bhor. Except Phaltan these were all satisfactory. In the town of Taradgaon, one of the largest in the State of Phaltan, I collected the people together and personally explained to them and the village officers what was required of them. The vaccinator has since visited the town with better results than before my visit. In the Bhor State, especially in the towns of Bhor and Shirwal, the arrangements are simply nil, and this notwithstanding that the former is the seat of Government and that the latter is the head quarters of a mamledar. In the town of Bhor little or no work has ever been done, for the simple reason that no one countenances the vaccinator. When I visited it I received no assistance whatever in my official capacity. At Shirwal I found the mamledar was absent from the taluka on leave and that the awal karkun was in charge. This man told me he had nothing to do with vaccination, vaccine registers or any matter connected therewith,

but then he prevaricated so much I could not rely on a single word he said. I was obliged to bring these and other matters to the notice of the political agent. In my report for 1872-73 as Acting Superintendent General of Vaccination I made a few remarks on the necessity for employing an additional vaccinator in the Bhor state. Since I re-assumed charge of this circle I have submitted through the political agent a detailed statement of what I propose should be done. I hope the scheme will be carried out.

From Bhor I went via Jejuri to Saswad and inspected the work of the Purandhar taluka vaccinator and the Jejuri and Saswad dispensary medical officers *en route*. The vaccinator I found working steadily and successfully. As also that at Saswad some vaccination work had been done. But at Jejuri no work whatever had been done and the hospital assistant was unable to do any. From Saswad I went to Poona, for the purpose of undergoing an examination in the Marathi language. Having passed successfully I proceeded on the 3rd March to visit the Mawal taluka and thence on the 8th I proceeded on three months' privilege leave.

During four months I inspected the whole of the Ahmadnagar and Poona collectorates, a considerable portion of Sholapur and the Malsiras and Wai talukas of Satara with the native States of Bhor and Phaltan. I travelled 1,091 miles, visited 202 villages, and inspected 4,863 vaccinated children, the work of about 25 vaccinators and 8 dispensary medical officers.

SOUTHERN CIRCLE.

Superintendent.—Surgeon J. Raby.

Establishment.—5 assistant superintendents,* 2 clerks, 37 vaccinators under local funds, 6 under municipalities,† and 25 under native states. Total 68 vaccinators and 20 dispensaries.

Population 4,757,127. Total cost Rs. 31,885-15-2. Average cost of each successful case 6 annas and 3 pies.—

Establishment.	Year.	Total number of persons vaccinated and re-vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those "unknown" from the total.	
			Increase.	Decrease		In primary vaccination.	In re-vaccination.
Local funds	1872-73	39,804	.....	.....	34,149	90·8	51·1
	1873-74	54,347	14,543	.....	46,637	92·2	61·2
Municipalities	1872-73	4,717	.....	.....	3,965	91·9	59·1
	1873-74	5,224	507	.....	4,550	94·5	58·9
Native states	1872-73	31,050	.....	.....	27,132	92·9	73·5
	1873-74	33,475	2,425	.....	29,787	93·7	61·0
Dispensaries	1872-73	5,126	.....	.....	4,222	87·5	64·1
	1873-74	3,602	.....	1,524	2,711	89·8	35·9

This is the first report I have had to submit since the re-organization of the department in 1871, and though other reports have been submitted since then by acting superintendents, who for the most part were only acting for a few months of the year, and consequently could not become acquainted with the vaccinators or the districts, yet such justice could not, or was not done to this circle, as under other circumstances and fewer changes might have been the case. For instance in April 1872 Dr. Robb, who had been acting for six months in this circle, was transferred to the Central circle, and again a new superintendent appointed, who had to go over all the work of Dr. Robb, in order to get a knowledge of the work and the vaccinators. The consequence was that one collectorate of this circle was left entirely unvisited by any superintendent for over three years.

Remarks regarding the ill effects of frequent changes of superintendents.

2. The return of numbers vaccinated by the different establishments for the year 1873-74 compares very favourably with those of past years, in most respects, excepting dispensaries —and it affords me considerable satisfaction, which I venture to think will be shared by the Superintendent General of Vaccination, to be able to show such a decided improvement, not only in the numbers actually vaccinated, but in the higher percentage of success and in some reduction of the

Progress.

* One of them is maintained by Kolhapur State.

† A seventh was appointed for Dharwad just before the year closed.

average cost of each successful case. There is however still room for improvement in the percentage of successful cases as well as in other respects.

Total operations.

3. The total number of persons primarily vaccinated, exclusive of dispensaries, is 90,780 and of re-vaccinations 2,266. The number successfully vaccinated of the former is 79,683 giving a percentage of success of ~~91·8~~; of the re-vaccinations the number successful is 1,291 which gives a percentage of 61·0.

Dispensaries.

4. Of the dispensary vaccinations, the total number of persons primarily vaccinated is 2,637; of successful 2,365, giving a percentage of success of 89·8. The total number of persons re-vaccinated is 965, 346 of whom are reported successful—rather more than half being unsuccessful—and giving a percentage of 35·9 of successful.

Taking the whole establishments, the total number of persons vaccinated including the re-vaccinated is 96,648 thus exhibiting, compared with the year 1872-73, an increase of 15,951—the largest increase that has ever yet been attained in this circle in any one year.

Causes of increase and decrease.

5. This increase is chiefly under the local fund establishment, and spread pretty equally over all the collectorates, though the native states' vaccinators, as will be seen from the foregoing table, likewise show a creditable increase. The state of Sawantwadi was transferred to this circle on 1st November last. This is the only change that took place in this circle under the new distribution of circles, so no remarks are required more than to state that the vaccinations in that state compared with the previous year show a falling off of 389*. There is a slight falling off in dispensaries, accounted for partly by reason of those dispensaries where there is a municipal vaccinator ceasing to carry on vaccination, and other dispensaries doing little or no work—such as Halial, Supa, Ilapur, Siddapur, and few vaccinations have been done at Kaladgi. The Kumpta dispensary in charge of Assistant Surgeon Mackenzie is a bright exception to this, and the vaccinations done by him and the former officer, both as regards numbers and quality, are very creditable. He likewise vaccinates in villages near Kumpta. So favourable a result as the above sketch is not a little due to the dismissal of several vaccinators for indolence and inefficiency, notices of which have been sent to the different vaccinators at once, as warnings: also to the increased attention and vigilance displayed by some assistant superintendents, and to the many circulars that have been issued throughout the year. Finesh ave likewise been inflicted, and I regret to say on some vaccinators with very little apparent improvement. These fines have not only been inflicted for bad work, but for negligence in the despatch of returns.

Progress in Belgaum zilha.

6. Of the progress of vaccination in the Belgaum collectorate, an increase of 3,780 persons operated on, would seem as if it were tolerably satisfactory, but there are a great number of villages unvaccinated, some of the talukas being too large and populous for one vaccinator to go over all of them in two years. In Athni, vaccination makes very little head, and though the collector, Mr. Boswell, has interested himself and made enquiries about it, the people are still very reluctant to submit their children to the vaccinator, and still more so to allow the vaccinator to extract lymph. I have also had complaints of the want of assistance rendered by the village officers who have in some instances refused to be present on the vaccination days, and when such complaints, accompanied by the printed notice that is usually sent to village officers, and on which their signature is taken, have been forwarded for investigation, they have retorted that the vaccinator was not present on the day in question. The collector appears to consider that in such cases the word of the vaccinator and his peon are not trustworthy, so it is

* This incudes the decrease at the Sawantwadi dispensary.

difficult to see how the case can be satisfactorily met, except as the collector suggests, by the vaccinator taking the signatures of some influential persons in the village certifying to his having been present at such a time; but in small, out of the way, villages, where not only the patil, but, all the villagers are antagonistic, this course is hardly feasible. The only plan that I see is to repeatedly call on the patils by sending them notices on certain days when the vaccinator has lymph, but this of course greatly delays work and the vaccinator loses his lymph. In the Belgaum taluka the vaccinator, Shaik Kadar, has vaccinated 2,284 persons. In the Chikodi taluka the two vaccinators have operated on 3,608 persons, nearly doubling their number of the previous year: but in both these talukas there are many villages left unvisited which the vaccinators have been unable to reach. Compared with the previous year all these vaccinators, with the exception of Gokak and Bidi, have improved their numbers. The Parasgarh vaccinator was fined by the Superintendent General for having so many unknown and unsuccessful in his return, he has been doing better since. In the Sampgaon taluka during my tour I found some persons in villages endeavouring to obstruct the vaccinator by representing to the people that vaccination is useless, and that bad effects might follow it. It was useless speaking to the men, so I reported the matter to Mr. Stewart, the first assistant collector, who stated he could do nothing but caution them. In other villages the patil refused to be present or to aid the vaccinator; these cases Mr. Stewart took cognizance of by inflicting small fines which however proved a sufficiently strong measure to induce them to be more attentive in future, and smoothed the way for the vaccinator.

Progress in Kaladgi zilha.

7. In the Kaladgi collectorate there is an increase of 3,869 persons vaccinated, the total number being for the year 14,188. Of these 12,165 are successful. That this, however satisfactory it may be in the way of an improvement, is what it should be, I am far from admitting, and in future years, I hope to see a still further increase. Compared with the preceding year all the vaccinators have increased their operations; particularly worthy of notice is the Badami vaccinator. In this taluka, it must be noted, however, there are less difficulties to be overcome than in many others, such as Mudibihal, Hunugund, and Bagewadi where a vaccinator has only been permanently located since Dr. Pinkerton's re-organization of the department in 1871. One or two vaccinators of this zilha are moreover reported inefficient by the assistant superintendent on account of want of education and tact. A municipal vaccinator has been sanctioned for Gulatgad and the surrounding villages (Badami taluka) some time since, but though I have repeatedly written for information as to the pay, &c., of the vaccinator, none has hitherto been received, so that the appointment has not yet been filled up.

Progress in Dharwad zilha.

8. In the Dharwad collectorate I have likewise an increase of 3,209 over the previous year to exhibit, but this falls far short of what it ought to be. In reviewing the operations of this zilha, I am bound to state that the vaccinators have no ordinary amount of opposition to contend with and Mr. Robertson, the collector, states that in some parts the people will not accept vaccination in any shape or form, and the collector's influence in the matter of vaccination, whatever it may be in other affairs, appears insufficient to effectually spread vaccination in some of the tálukás. Notably is this the case in the tálukás of Ron, Dambal, Ranibednur and some parts of Kod and Karajghi, in the three former vaccination makes little or no real head. This is, in my opinion, in a very small degree, if any, attributable to want of energy or tact on the part of the vaccinators; I can say so because I am personally well acquainted with them; some of them have done plenty of work in other tálukás. I have also been informed by the 1st assistant collector in reply to numerous reports which I have forwarded for investigation, that the people are very ignorant and refuse to have their children vaccinated. Whether such an excuse is valid or not I leave to others to say, but I may compare the progress vaccination

has made in one taluka of the Dharwad district, *viz.*, Hangal taluka, where a late district officer, Mr. Middleton, I know interested himself with the state and progress of vaccination in Ron and Dambal. The vaccinator of Hangal, Mannarswami, has this year vaccinated 2,706 persons. He was the previous year in the Ron táluká where he did only 231 vaccinations. This year in Ron the vaccinator, Girmalappa, has vaccinated 695, an increase certainly, but very little really. In the Hangal táluká, Mr. Middleton, as I myself am aware, fined some village officers who neglected to aid the vaccinator and warned others. The consequence was, as I personally saw, that as a rule the vaccinator had no difficulty whatever worthy of mentioning. Mr. Stewart has followed a similar course with the most beneficial results and the mamlutdar, Mr. Gururao Raghvend, gives active and ready assistance at all times. I wish I could say as much with regard to the mamlutdars of Ron and Dambal, viz., Messrs. Bhagwant Rao and Bittu bin Maji. Mr. Robertson, however, disapproves of these measures, I believe, and though he informed me in October last, that he had issued strict orders to the mamlutdars, that all cases of neglect on the part of village officers should be severely dealt with, yet when I visited the Dharwad district, more than once I had occasion to report village officers for neglect, and inattention to my own notices to collect vaccinated persons for inspection and to bring their registers to my camp for inspection and signature; very little notice, if any, appears to have been taken of such conduct, nor have I as yet—now some three months since—been informed of any action having been taken regarding such reports. I certainly have more difficulty in the Dharwad district than any other of this circle.

Progress in Kanada zilha.

9. In the Kanada collectorate there have been 10 vaccinators during the year, but there has been a good deal of sickness among them, and four have been dismissed for inefficiency and other causes. There is always a good deal of sickness in this district, so that it is difficult to keep up the full complement of vaccinators throughout a year; and though the population is not so great as it is in other collectorates, still more vaccinators are required in proportion, because of the insalubrity of the climate. Various changes on this account have been recommended and are under consideration which will be noticed further on. The total number of vaccinations during the year is 15,789 which compared with the previous year gives an increase of 2,943. The low percentage of successful is chiefly due to the bad work of the Bhatkal vaccinator, who was dismissed by the Superintendent General, when he was in this district, near the end of the year. The Ilapur vaccinator, Ramiah Baduth, on my visit in February, I found totally unfit for the duties of an itinerant vaccinator. He was appointed in 1872 by the acting Superintendent General of Vaccination. The Superintendent General who joined me at Sircy in February and saw him concurred in the advisability of his discharge but he has been allowed to continue pending the appointment of his successor, whom, on account of the peculiarities of this district, we are endeavouring to select from the inhabitants of the district itself. Dr. Pinkerton travelled with me throughout the greater part of the Kanada district, and is now well acquainted with the exceptional nature of its requirements. In October 1873, the collector, Mr. Macdonald, on account of the prevalence of small-pox in the Supa petha, appointed an extra vaccinator, who has done very good service up to the end of the official year, but I regret to say, he has, about the end of the year, been incapacitated by sickness. Last year several persons died of small-pox here which appears to have made the people flock to the vaccinator *en masse*, and he has vaccinated whole villages both old and young. Such a thing I have never witnessed in any part of this circle before, and I attribute it in no small measure to the exertions of Mr. Macdonald, seconded by the mahalkari, Mr. Ramkrishnapa. This collectorate has not been visited by any superintendent since I was here in 1869, so that it can hardly be wondered at if the vaccinator's books and records should not have been found in as good a condition as they should be, and probably the fact of the assistant superintendent not having been brought in contact with the superintendent may account for his

remissness also. I am however not at all pleased with the way in which this assistant superintendent has conducted his duties, but I think from the way in which Dr. Pinkerton spoke to him about his neglect, he will probably do better in future. Kisansing Kaluram of the Halial táluká has given me much trouble and I have more than once had occasion to fine him. He is always late with his returns, and always ready with some frivolous excuse in extenuation, besides, he does not work regularly through his táluká. I have warned him more than once and deferred the question of his dismissal till I should see him which since the close of the year I have done, and find him careless and inattentive to most of the circulars I have issued with no valid excuse whatever. He has promised faithfully to amend which I have no doubt he can do if he likes.

Native states.

10. It is a pleasing feature in this report to note the steady improvement in the vaccination of native states and the appointment of vaccinators for outlying districts. Last year the appointment by the Chiefs of Jamkhandi and Miraj of vaccinators to their districts of Kundegal and Lakshameshwar in the Dharwad district has been followed this year by the Chief of Sangli appointing vaccinators for his district of Shirhati in the Dharwad collectorate and Mangalveda bordering on the Kaladgi and Sholapur collectorates. These new vaccinators have done very little work, probably on account of being fresh to the work, and the people among whom they are employed being ignorant of the benefits of vaccination. The total number of persons vaccinated during 1873-74, is 34,816.* The increase in the native states vaccinations compared with 1872-73, is 2,150*. Speaking personally of these native states' districts I found very much less difficulty in collecting vaccinated children for inspection than in our own districts. At the commencement of the year I arrived from England and in April travelled to Baura to enquire into some reported falsifications in the returns of the vaccinator which were discovered by Assistant Superintendent Dattu Balappa, who has since been transferred from Kolhapur to Kaladgi. I investigated this matter in several villages and finding many false names dismissed the vaccinator. A new assistant superintendent was selected from among the Kolhapur vaccinators and appointed in September last. He is somewhat new to the work, but is an active and intelligent young man whom the Superintendent General has seen and approved of.

Municipal vaccination.

11. Though there appears from statement No. III to be 7 municipalities' vaccinators in this circle yet six only have been effective throughout the year, the Dharwad municipal appointment having been created only at the end of the official year. The appointment of a vaccinator for Dharwad was in no small degree brought about by my direction to the táluká vaccinator in December last to discontinue his operations in the town of Dharwad. He had been continuously working there for 9 months to the neglect of the taluka in his charge. This appears to have stirred up the residents of Dharwad who would seem to have considered they had an undisputed right to the every day services of the vaccinator. Shortly afterwards a case of small-pox occurred, and the vaccinator was ordered back for a time, but the necessity of a permanent station vaccinator was thus rendered apparent. A municipal vaccinator is likewise to be appointed to Gulatgad of the Badami táluká. All the municipal vaccinators with the exception of Hubli have increased their operations—the total increase on the previous year being 507. With the villages under their charge many of these vaccinators ought to do more than they have done. The total number of primary vaccine operations is 5,249, of successful operations 4,517, giving a percentage of success of 94·5. The municipal vaccinators do more infantile vaccinations than the other vaccinators, which is easily accounted for.

12. The percentage of those primarily vaccinated in statement No. I above one year old is 25·0 and below it 75·0. This is to be regretted as it is very desira-

* This includes the vaccinations at the dispensaries of Kolhapur and Sawuntwadi.

ble more generally to vaccinate infants. This point has been more than once during the year brought to the notice of the vaccinators, who state that the mass of the people have an insuperable objection to submit very young children. I have paid considerable attention to this subject, on my tour, and have endeavoured to procure, on my visit to villages, young children for operations whenever there was fresh lymph, but the people as a rule certainly do object.

Age.

13. The proportion of males to females taking the grand total of the persons primarily vaccinated is 52·2 to 47·8. The percentages of castes is Christian ·6, Hindus 87·1, Musalman 7·2, Parsis none and other castes 4·9.

Sex caste.

14. The lymph in use during the year has been generally reported good, and that I have inspected on tour, with few exceptions, has been satisfactory. Some of the men have occasionally lost their lymph, which has cost much trouble and inconvenience in its renewal, more so especially as no tubes have been forthcoming for some months, the supply in Bombay having become exhausted. Fresh lymph has been received from England through the Superintendent General and spread through some talukas, but it has not been so generally for want of tubes. Lymph has also been supplied to civil surgeons, dispensary officers and others.

Lymph.

15. Small-pox has been more or less prevalent throughout the circle, especially in some parts of the Kanada collectorate, in the Karwar and Bhatkal talukas where the assistant superintendent was engaged for some months in 1873 endeavouring to stop its ravages, but the people were very reluctant to have their children vaccinated. In some cases assigning as a reason the prevalence of small-pox, in others the reverse, which can only be regarded as frivolous excuses for avoiding the operation altogether. The Bhatkal and Karwar taluka vaccinators have both however been dismissed during the year for inefficiency. At Karwar small-pox has been prevalent almost every month throughout the year; its prevalence there has been attributed by the civil surgeon to the proximity of Goa, whence the disease is introducted by the Goanese coolies who are mostly unvaccinated. The type of disease has been a fatal one and it has, no doubt, in Karwar and the surrounding villages found a fertile field. There seems to have been some misunderstanding as to whom these villages belong, *i.e.*, the taluka vaccinator or the dispensary officer who is also a municipal officer, specially paid for vaccinating in the municipal villages, but he has taken charge of these villages without really being able to attend to them as they ought to be attended to, as far as vaccination is concerned. A separate municipal vaccinator will shortly be appointed so that such a state of affairs will not recur, and in the meantime the taluka vaccinator is working in these villages, which I personally visited and had the promise of hearty co-operation on the part of the village officers henceforth, whom I particularly impressed with the necessity of not allowing a single person to remain unvaccinated. This has had already an excellent effect, due more probably to the active assistance of the collector and Mr. Ingle than to any efforts of mine. In the Bankapur taluka I found small-pox prevalent in a village on my visit, no report of which had been made to the mamledar by the village officer. I had lymph with me and vaccinated several children and subsequently sent the vaccinator to the village.

Small-pox.

16. During the year I have seen all the assistant superintendents of this circle. The Belgaum assistant superintendent, Balwantrao, is a new man who was transferred from the Central circle and promises well. The Kaladgi assistant superintendent, Dattu Balappa, was transferred from Kolhapur. I found him of much assistance during the year in the way of explaining to some of the vaccinators the nature of their duties, and checking many irregularities. These assistant superintendents can render

Assistant superintendents.

the superintendent the greatest useful assistance not only in inspecting vaccinators' lymph and general work, but in seeing, on their repeated visits to each vaccinator, that they are working regularly through their charge instead of skipping from place to place and residing too long in one place. Regarding the Kanada assistant superintendent, Dhankoti Dasrathi, I have previously referred to him but may state again that I have not found him as active or attentive to directions as he should be. I have had occasion to severely reprimand him and he has been fined heavily by the Superintendent General. The Dharwad assistant superintendent, Swamirao Rango, accompanied me for nearly two months in his district, and I examined much of his old inspections which I found fairly correct. He is not as active or quick in his inspections, in detecting inaccuracies in returns, as I think a good assistant superintendent should be, and does not appear to have that amount of tact which is desirable. The selection of assistant superintendents in this circle from among the vaccinators will not in future be difficult, as there are three men in the Dharwad zilla alone who would probably make good assistant superintendents. These are Mannarswami, Girmalapa Virappa and Shaik Budan, though I should give a decided preference to the first named, who was not promoted before, on account of his being so short a time in the department.

False entries.

17. It is very rare that any false entries in returns are brought to light now that the vaccinators' registers are subject to such close scrutiny. None have been reported during the year—the Baura case before alluded to having been brought to light previous to the termination of the year 1872-73. In my inspections, though I have paid a great deal of attention to it, I have not discovered a single false name. In some places so many children are called by similar names that, it is sometimes difficult to correctly call them over, and the villagers themselves confound one child with another, so that, on a reported false case, unless the most careful and rigid investigation is made, especially in the jungle villages of Kanada, an innocent man may be very liable to be made a sufferer. Such a case was reported by an assistant collector of Kanada who requested that the vaccinator might be dismissed, which I refused, pending a personal enquiry. It had reference to the Halial taluka which I have lately visited, and I find that the vaccinated persons entered in the register are correct, but that they were entered on the wrong dates—the entries in the village register being for one month, in the vaccinator's for the other. This occurred from the vaccinator closing his monthly return before the expiration of the month.

Pay of native states' vaccinators Kolhapur.

18. In 1869 Colonel Anderson, the political agent Kolhapur, on my representation raised the pay of most of the vaccinators in the Kolhapur state, and I made out a gradation scatle which through some oversight was not adhered to during the time I was on leave. Certain changes having taken place in the Kolhapur district, I again addressed Colonel Anderson on the subject, submitting a scale of pay for the Kolhapur and Chiefs' vaccinators generally, which I recommended to be introduced. I also requested that permanent peons might, as far as practicable, be attached to all vaccinators, at a fixed rate of salary. The former, with immaterial exceptions, met with Colonel Anderson's approval and sanction so far as his control extended, so that, there is now little matter of complaint as far as pay goes. A representation was also made to the Native Chiefs, some of whose vaccinators, it seems, are paid partly in land, the real value of which it is difficult to estimate—so that the Chief of Kurandwad did not seem inclined to increase his vaccinators' pay at present, especially as there are two. The Jamkhandi Chief acceeded to the recommendation *in toto* so there will be no excuse for his vaccinators doing little work. They each receive Rs. 14 per mensem and Rs. 7 each for a peon. The Sangli Chief's vaccinators receive horse allowance, so also does the Ramdurg vaccinator, these Chiefs therefore considered that sufficient, especially as the former has appointed extra vaccinators for outlying districts. A similar reason was given by the Chief of Miraj. In nearly

all the states permanent peons have been granted at salaries ranging from Rs. 5 to Rs. 7. On the whole the response of the Chiefs has been satisfactory and encouraging. The Miraj vaccinators (senior branch) are paid rather low, Rs. 12 and 10 per mensem. As one of these men has been in the department many years I regret that the Chief did not see fit to allow him some little extra reward for his services.

Inoculation.

No reports of the practice of inoculation have been made to me during the year.

20. As regards my tour there is little more to add to what I have already mentioned in the different paragraphs referring to collectorates and native states.

Tour.

The particulars will be observed in statement No. VII. I may merely state that in March 1873, near the end of the official year, I resumed charge from Surgeon-Major Lewis. I shortly after travelled to the Kolhapur district. I returned to Belgaum for the monsoon, after which, in November, I was detained three weeks near Belgaum, waiting for an examination committee to examine me in Mahrathi; which I passed. This prevented my going over all the talukas of the Dharwad collectorate as I had intended, however I managed to see all the vaccinators about their returns, books, &c. Most of my attention has been devoted to Kanada. To sum up briefly I may state that during the year I have visited and inspected 246 towns and villages, inspected 9,738 vaccinated children—the greatest number that has ever yet been seen by a superintendent of this circle in any one year and travelled 1,488 miles. The inspection of children in many talukas of this circle is a matter of much difficulty. I have frequently been able in one day to see 200 or 300 cases in one village whereas in another I may travel miles, visit 3 or 4 villages and not be able to inspect 50 cases. In Kanada, on parts of the coast, without any trouble whatever, I have inspected, in an hour or so, 200 persons calling the names from the register. In Dharwad I may go to village after village, and, find no notice paid to my order, on arrival. In the town of Dharwad itself, I waited three days before I could get any children collected for inspection, and then had to write to the deputy collector in charge before I could get any thing done.

21. The total number of villages visited by the five assistant superintendents is 1,719 and the number of vaccinated persons called from the registers by them is 39,572 which plus those I inspected and which had not been previously inspected by the assistant superintendents 8,029—gives a total of 47,601 or nearly half the number of persons vaccinated in this circle during the past year.

Assistant superintendent's inspections.

22. The work of assistant superintendents and the time of each on duty in his district is shown in the following table:—

Assistant superintendents.	Number of encampments.	Number of travelling days.	Number of miles travelled.	Number of villages visited.	Number of vaccinated children seen.	Number of months on duty.
Balwantrao Ganesh	114	196	1,609	274	5,834	7
Swamirao Rango	172	194	2,074	468	8,645	10
Dhankoti Dasrathi	125	282	2,030	286	7,461	11½
Dattu Balappa	135	217	1,819	410	9,043	10
Ramachandra Balaji	88	201	1,573	281	8,589	7

The only two assistant superintendents that can be advantageously compared with the previous year are the Dharwad and North Kanada—the other three are new to their districts and two of them have been only 7 months at work.

Syphilis.

23. In the course of my tour I have not seen or heard of any infection of syphilis following vaccination, but I have seen some cases with some ugly-looking scabs over the body after vaccination which I attribute to the vaccinator using purulent lymph. I regret to say I have found some of them doing so. Many of the vaccinators are young hands and unless they have been carefully trained become very careless in the manipulation of lymph. I have found some vaccinating with blood mixed with lymph. For this the vaccinator should invariably be punished and it would be well it he could be suspended for a couple of months, if a substitute could only be at once provided which seldom happens to be the case.

Candidates.

24. The supply of candidates is a matter which deserves more attention than has yet been paid to it, especially in these days of education and progress. I find much difficulty in getting properly qualified men at a moment's notice, so to speak. There is no lack of candidates or of good men, but they refuse to learn with a vaccinator, for two months, and then remain in the superintendent's office another month without pay, and perhaps be another month before an appointment can be given them. Applicants apply and sometimes come long distances to present themselves for examination in the rudiments of arithmetic, reading and writing, &c., as they have to do, unless they have passed the prescribed examination for entry into the public service but they want almost invariably a place at once, forgetting that they are totally ignorant of the duties they are required to perform. This difficulty of procuring efficient men, at short notice, especially when the superintendent is on tour, renders the filling-up of some vacancies, until a considerable time has elapsed, almost impossible, and in the urgency of the moment inferior men must occasionally creep in. To remedy this possibility, and enable the superintendent always to have competent men ready for appointment, I would suggest that a candidate, on a small salary, be always attached to the superintendent's office. By this means, he would not only be ready for employment, as a substitute or otherwise, in case of vaccinators going on leave, but could be sent off at once to places where the services of a vaccinator might be urgently required. This want of a qualified man, ready for immediate employment, I have lately had occasion to feel acutely. In the Supa petha a temporary vaccinator, J. M. De Souza, has been employed. Just before my arrival there, he became sick, but managed to keep up his lymph for me to see. In this taluka, after the commencement of the monsoon, very little work can be done, so that it is a great object to do all we can in the fair seasons. Unfortunately the man got worse, a substitute not being ready at hand the lymph was lost and the work interrupted.

Village registers.

25. Village registers are fairly kept up in all villages of this circle in the amended and more simple form. A few cases of their not being so, has been reported by the assistant superintendent which have been remedied. Formerly it was the custom to remove these registers every year from the village to the mamlutdar's kacheri. In future the collectors, except Dharwad, inform me in reply to my representation, that these registers will either be kept altogether in the village to which they refer or not removed till after five years. They are also to be kept in a proper book, instead of on slips of paper, for ready reference.

Aid from civil and political officers acknowledged.

26. To the civil and political authorities generally my thanks are due for the ready aid they have afforded me and the countenance they have given to the cause of vaccination.

Office.

27. Regarding the office I have not much to say except that during the year there has been an unusual amount of extra work thrown on it on account of the many circulars that have had to be issued and the numbers of monthly and weekly returns that have had to be returned to vaccinators for correction or explanation over and over again.

WESTERN CIRCLE.

Superintendent.—Surgeon T. Cody,

Establishment.—6 assistant superintendents,* 2 clerks, 42 vaccinators under local funds, 4 under municipalities, and 3 under native states. Total 49 vaccinators, and 18 dispensaries.

Population 3,070,259.—Total cost Rs. 27,850-5-11. Average cost of each successful case 7 annas and 1 pies.

Establishment.	Years.	Total number of persons vaccinated and re-vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those "unknown" from the total.	
			Increase.	Decrease		In primary vaccination.	In re-vaccination.
Local funds	1872-73	56,137	.....	.....	51,096	93·6	72·9
	1873-74	60,298	4,161	.....	54,482	93·6	68·4
Municipalities	1872-73	2,596	.....	.....	2,311	95·6	68·7
	1873-74	2,642	46	.....	2,352	93·1	56·8
Native states	1872-73	2,979	.....	.....	2,652	94·5	14·2
	1873-74	6,016	3,037	.....	5,612	95·7	85·7
Dispensaries	1872-73	1,914	.....	.....	1,589	86·7	68·8
	1873-74	2,334	420	.....	1,964	85·6	74·1

Changes in the circle.

The figures for the year 1872-73 in the above table are not those shown for this circle as it then existed, but represent the returns for that year from the different districts of which it is now composed. While in the year 1872-73 this circle comprised the collectorates of Thána, Kolába, and Ratnágiri, with the native states of Jáwár, Janjirâ and Sáwantwádi, it now comprises the collectorates of Thána, Kolába, Násik and Khándesh with the native states of Jawár, Janjirá, and Penth, and the returns from the several districts for the year 1872-73 are taken from that year's printed report and given here, so as to be able to contrast the work for that season with the year under report.

Increase in circle.

2. So contrasted I have to show under every establishment head an increase which aggregates 7,664. The most marked increase, 4,161, took place in the local fund establishment, but this increase, though apparently large, falls short of what I might have expected; because the local fund vaccinators in Thána collectorate are over two thousand operations short this year as compared with last; and such a great drawback in part takes away from the otherwise good progress made in the other collectorates. This falling away in Thána took place altogether during the rainy season; as from June to October inclusive the average number of operations monthly barely reached 700 for the whole collectorate. A large rainfall which materially interferes with an itinerant vaccinator's progress, offers part explanation of this backwardness,

* Only 5 have as yet been employed.

Cause of decrease in the Thâná collectorate.

and taken together with a great and an undue amount of sickness amongst the vaccinators, prolonged even into November and December, fully accounts for the small outturn of work during those months. This latter cause more particularly, very seriously militated against a progress that was otherwise to be expected in the Thâná collectorate, and by means of it, the steady advance made in the other districts constituting this circle, is somewhat overshadowed. The increase in the native states amounts to 3,037 and is general, in varying proportions amongst the three states. The largest increase took place in Janjirá, viz. 1618, and is chiefly attributable to the lively interest taken in vaccination by the Assistant Political Agent, Mr. Larcom. The progress made in Jawár and Penth too is considerable, and is chiefly due to the fact of the vaccinators' operations being uninterrupted throughout the year. Under the municipal establishment the increase amounts to 46. There are four municipal vaccinators and they vaccinated 2,642. This is a small outturn for 4 men, but it must be remembered that they have much to contend with in the larger towns. The dispensary returns show an advance too on last year, which though small, may be taken as some slight indication of a growing popularity for these institutions as vaccination centres.

Increase in native states.

Increase in municipalities.

Increase at dispensaries.

3. The average number of operations performed by each vaccinator amounted to 1,407. Taking the establishments in detail, the range of the average is very considerable, as may be seen from the returns. At present I shall only allude to the different districts in which operations have been carried on and give the average outturn of work of the men employed in them. Thus in Thâná collectorate the average of the local fund and municipal vaccinators is 1,040, in Kolábá 1,575, in Nasik 1,386, and in Khándesh 1,547. The averages approximate pretty well in Kolábá, Násik and Khándesh and range fairly high, while in Thâná from causes before alluded to the reverse obtains. The average amongst the three native states vaccinators is 2,005. The largest number of operations was performed by the Janjirá vaccinator, Náráyan Shankar Joshi, viz. 3,057, and the smallest, 349, by the Thâná municipal vaccinator, Vithu Rághu. I refer here to the number of operations rather than to the number of persons, as the latter does not give a proper estimate of the time and labour expended, from the fact of many persons having to be treated more than once. The reasons for this very wide divergence are obvious. On the one hand we have a very tractable people, easily managed, and ready to avail themselves of the advantages held out for their acceptance, by the vaccinator; and on the other there is the converse of all this. Amongst the local fund vaccinators the largest number of operations falls to the lot of the Virdal vaccinator, Nánáji Lakshaman, and the smallest to the Rohá vaccinator Ráoji, Chimnáji. In explanation of the small amount of work by this latter, I must say that he has not been employed throughout the year, but was entertained during the last six months to replace an old vaccinator, Bábáji Vithal—now recommended for pension—whose failing powers, before such recommendation was found necessary, had thrown the work of his taluka so far back, that it was scarcely possible for a new hand to bring it up to the average before the close of the year.

Average number of vaccinations performed by each vaccinator.

4. Exclusive of the dispensary returns, to be treated hereafter separately, there were 68,399 persons primarily operated on in this circle during the year. Of this number 34,470 are males and 33,929 are females or percentages of 50·3 and 49·7 respectively. This excess in male subjects obtains in the three collectorates of Thâná, Kolábá and Khándesh, while in the collectorate of Násik and the three native states the females are in the majority. The excess in either case is so small that I do not think it significant of any conclusion regarding the readier submission of ei-

Number of primary vaccinations.

Sex.

ther sex to the vaccinator, and can only say that the proportions, as given, must be tolerably correct, from the amount of scrutiny the vaccinators' returns are now submitted to. Examining these numbers as to caste, it will be found that a per-

Caste.

centage of 88·8 are hindus, next come the outcastes who range at 6·8 per cent, next the musalmans 3·4, then the christians 0·8 and lastly parsis who bear a proportion of about .005 percent to the total. From want of any detailed information regarding the relative proportions these different races bear in the total population, I am unable to state with accuracy the relative popularity for vaccination these percentages may exhibit. Casual observation however leads me to the conclusion that they give a pretty fair idea of the relative extent to which vaccination is now received by the different castes; and I doubt much if I could show a more proportionate popularity for it amongst the musalmans and parsis even if I had exact figures at my disposal. There is a very considerable musalman population occupying the larger towns in this circle, more particularly the busy ports of Tháná and Kolábá, but I find as a rule the vaccinators meet such an amount of opposition amongst them that, they rather avoid the contest, and carry on their operations among the more tractable hindus. The native christian population met with in this circle is mostly confined to the two tálukás of Salsette and Bassein, where nearly all the subjects of this creed, shown on the returns, were operated upon. They exhibited a good deal of opposition in Salsette, and the vaccinator of that district reported to me, more than once, difficulties he met with in christian villages. However there is a slight advance over last year in the number of christians.

5. A great deal of the success of vaccination, as a prophylactic, depends upon the age of the subject to which it is exhibited; and bearing this in mind, I have always endeavoured to fully impress on my assistant superintendents and vaccinators, how much the ultimate good of their operations will be enhanced by being carried on amongst infants of a tender age. A good many of them are fully impressed with this, but then the opposition they meet with in obtaining infants to treat, renders nugatory to some extent their efforts in this respect. The people are loathe to permit of their children being vaccinated until such time as they are able to run about and partly take care of themselves; believing that, at this age they are better able to endure the operation than when infants in arms. This is a serious mistake and one that cannot be too frequently dilated upon. In the first place the child of poor parents at the running about stage has very little care bestowed upon it; and when vaccinated, is not prevented from scratching the vesicle, when it becomes irritable, thereby preventing it from running its natural course to maturity, to the material detriment of its protective powers. And again the fever of maturation seems to affect, with much greater force, children of this age than it does infants in arms, who bear the infection with the vaccine virus with wonderfully little disturbance. In infants the vesicle is seldom hindered from running its full course to maturity, principally because of their inability to either scratch or tear it open, and so its value both as lymph giver and protective agent is considerably enhanced. The former object speaks for itself, but regarding the latter I would here beg permission for a few observations in explanation of what I mean. A vaccine vesicle which, having reached maturity, is left unbroken and allowed to dry up or more technically to scab, permits of, during the process, much of the lymph it contains being absorbed into the system, and so its protective value becomes greater in consequence of this re-absorption, which takes back portion of the outpoured virus again into the circulation. When this fact is considered it will be readily understood, how necessary it is, that strong efforts should be made to ensure vaccination being carried on, when the subject is of such a tender age as will guarantee the vesicles being left intact; and having said so much, I now proceed to show what progress has been made in this circle in carrying out infantile operations during the past year.

6. Of the total number of 68,399 persons primarily vaccinated 25,552 were

Age.

under one year old and 42,847 were over one year or percentages 37·3 and 62·7 respectively. This is the

ratio which pertains in a combination of the returns from all the districts; but if they be taken in detail it will be found that some districts are far in advance of others in this respect. Thus in the Thána collectorate the precentage of operations on subjects under one year is 40·7, and that in subjects over one year 59·3. In the Kolábá collectorate there is an improvement on this; for here the percentage under one year is 51·5 while that over one year is 48·5. The Násik collectorate as regards infantile operations is but a shade better than the general result for the whole circle, for here the subjects under one year numbered 38·7 percentum while those over one year were 61·3. In Khándesh the percentage under one year is 35·3, and over one year 64·7. In the native states, matters, in this respect, are not so satisfactory, but this may be accounted for by the amount of leeway to be made up, as vaccination in them, is a thing of recent introduction. The percentages of the three states taken together stand at under one year 16·5 and over one year 83·5. Contrasting these results with similar ones attained in 1872-73 as taken from the published report I have to show an advance in all the districts with the exception of Khándesh.

Result.

7. The result obtained in primary vaccinations gives a percentage of success of 93·7 and that in re-vaccination 67·5. The former is not so good as I would wish; and I think a good deal of this low rate is to be attributed to the failures which occur amongst persons who ought rather to appear in the re-vaccination columns than in the primary. Grown up children may have had slight attacks of small-pox and the fact easily escape the notice of the vaccinator at the time of his operating; and so, while from the previous invasion of the natural disease they are rendered impervious to the action of vaccination, they are shown on the returns as failures of it.

Lymph, vesicles and cicatrices.

8. The lymph in use throughout the year was generally good and active, and these qualifications regarding it I have had frequent opportunities of personally ascertaining, and have received many reports, testifying to the same, from the assistant superintendents. It absolutely failed but in one instance, and that was in the hands of the Bhosawal vaccinator, Ganesh Somnáth. In the south-eastern extremity of the táluká, I came on two villages on the 7th day after the vaccinator's visit, and found all his cases complete failures. The lymph he used, I found, he brought on glasses; and as his explanation for not bringing to the villages, a vaccinifer, and excuse for the failure of his lymph were far from satisfactory—too evidently subterfuges to screen his own wilful negligence—I fined him heavily, and put him under stoppages until such time as I found his lymph and work favourably reported on by the assistant superintendent. I had his lymph renewed from the bordering táluká, Sáwadá, where the vaccinator, Sitárám Sadáshiva, had some of very good quality in use which I saw in six different villages. This was the only instance where the lymph absolutely failed; but there were two tálukás, in which a renewal of the lymph was found necessary, in consequence of that in use not being quite satisfactory; they were Sinnar and Páchorá. Considering the lymph was in this active state it may not unreasonably be expected that a better percentage of success should have been obtained, but the cause I alluded to in speaking of results has much to say to this. The vesicles I saw were generally good, and with the two exceptions above referred to, they were both large and characteristic. The cicatrices I examined myself on the arms of some 14,425 children were generally very fair, and I have had, from time to time reports from my assistant superintendents similarly characterising those they examined on the arms of 26,954 children.

Small-pox.

9. From returns I have received through the different district magistrates, it appears that there were 9,020 cases of small-pox in this circle during the year; and of these some 1 568 are reported to have died. A further analysis shows that, of the numbers

attacked the returns record 1,420 of them as having been previously vaccinated, of whom 787 are said to have died. Of the remaining 7,600 persons attacked and who were not previously vaccinated 781 are said to have died. Thus, according to these returns, of the people who seek protection from small-pox by vaccination, and who subsequently are attacked by it, 55, or rather more, percentum will die, while those who have sought no such protection and who are attacked by the disease succumb to it at the rate of 13 percentum. I think this *per se* is quite sufficient to show, without any further remark, the utter worthlessness of the information we are forced to depend on with regard to the prevalence, fatality &c. of small-pox. The mere statement, that the mortality from small-pox amongst the previously vaccinated is some 55 percent, at once places without the range of reliance the whole body of death returns. The fact indeed chimes in very much in accordance with the received views regarding vaccination amongst a great mass of the native community, and that is, that it only serves to draw down on their devoted heads the anger of a goddess who would be otherwise passively quiet; probably this fact may have not been far from the minds of the village officers when filling up these mortuary returns and that it may have, in some unaccountable manner, influenced them. However this may be, the fact exists, and I think in the face of it I may be excused from putting any trust whatever in the returns from which I extracted it. Seeing, as I have, frequently, the manner in which these statistics are recorded, the amount of intelligence amongst the men to whom they are entrusted, and over whom no guidance or control in this respect seem to be exercised, I cannot wonder at any result they may lead to. That small-pox did exist in these districts and to a greater extent than these returns show I am fully aware, but what the mortality from it was, I cannot do more, than give a mere conjecture. Probably the 13 percentum before alluded to would be a fair estimate; but considering that the sufferers are not submitted to skilled treatment in most instances, it would be found rather under the exact rate of mortality if that were attainable. Taking as correct the total number of deaths recorded in this circle from small-pox, viz. 1,568 that will give a death-rate from this one disease amongst the entire population of about 52 for every 100,000 of population. This rate of destruction is startling indeed, and should call of itself for some remedy, more especially when it is placed beside the fact that in countries where vaccination is made compulsory the rate of people who are merely attacked by small-pox averages about 2·3 for every 100,000 of the population as shown by the Irish Census Commissioners in their report for 1872-73.

Inoculation practised.

10. Having said so much regarding small-pox I would here offer a suggestion as to the best means, under existing circumstances, of mitigating its ravages. Of course the only effectual mode of doing this, would be to make vaccination compulsory, but in the absence of compulsion, on the expediency of which opinion seems to be divided, though none differ as to the good which would result therefrom, it is necessary to caste about for some other means possessing more favour. First, I think, the prohibition of inoculation is a matter for the consideration, of which I make bold to say, the time has fully arrived; and notwithstanding that Government in their resolution on last year's report were pleased to view coldly any suggestions to this effect, I am emboldened by the fuller conviction another year's experience has forced upon me of the want of such a measure, to again refer to it here. I entirely base my convictions regarding this want on the fact that practisers of inoculation wherever they carry on their operations establish *foci* of contagion to the imminent danger and sometimes utter destruction of many people in the neighbourhood. In saying this, I am not giving vent to any thing new, but am merely repeating a fact already but too well known. As early as the opening of the present century the college of Physicians, London, in their report on the practice of inoculation pointed out that, the receiver of it, though enjoying a protection for himself, acted as a contagious centre from which others become affected. Now, it is also a fact, pretty widely known, that the recipient of the natural disease by

inoculation, has sometimes his own life placed in jeopardy, by the very means he seeks for protection, as well as being a source of danger to those around him. For while the disease, so inoculated, may show itself in a few scattered pustules, with more or less of febrile disturbance, it may also come out in the confluent or most fatal form, and so actually destroy the life it was meant to preserve. I think that having said so much, I have said enough to show that, the practice of inoculation is not only dangerous to the life of the individual, but it is also dangerous to the public health generally: and yet, while a remedy is at hand, for the punishment of those who exhibit such dangers by other means, this is left to hold its way unquestioned. That inoculation is pretty extensively practised in some districts of this circle I have had frequent intimation of, and though in every case that has come to light the aid of civil authorities has been sought to prohibit it, yet I am fully convinced that it will never be effectually stopped without giving power to punish those who persist in practising it.

No ill effects of vaccination.

11. After something over 5 year's experience now of the department, during which time, I may say I have tried to be as observant as circumstances would permit of, I have never noticed an instance where a specific disease other than cow-pox was introduced into the system through the agency of vaccination. I have however sometimes noticed ulceration, but not of a specific nature, at the seat of the vesicles which I have been always able to account for in two ways. The first was ill-treatment of the vesicle by the subject himself, tearing it open when it got irritable and applying some irritant remedies to it afterwards; and the second by the vaccinators making use of inflammatory lymph, or taking pus with the lymph, by pressing out too much, the vesicles on the vaccinifer. I once noticed an abscess formed in the vicinity of the vesicles, fortunately in time to remedy it, but this I only noticed once. With this slender experience of ills arising from vaccination I think I feel justified in pronouncing it benign in its effects.

Small-pox after vaccination.

12. That small-pox will sometimes occur after successful vaccination I do not think will now be denied; but then it is rather the exception than the rule, and it is, when so occurring, shorn of its fatality. I saw one unmistakeable case myself in a boy some 8 or 9 years old. He had three undoubted vaccine cicatrices on one arm which, I should pronounce very good, while scattered over the trunk and limbs were also indelible marks of small-pox pustules. His parents told me that he contracted the disease some three or four months after his being vaccinated, but that it affected him so slightly that he was not confined to bed or the house for even one day; while a brother of his, who was not previously vaccinated, and who contracted the disease about the same time, was so bad that his life was for a time despaired of and after recovery his face remained frightfully scarred, a fact I had myself an opportunity of witnessing.

Aid from civil authorities.

13. I have had to make many and frequent applications during the year to the different district magistrates for assistance, when the vaccinator met with unusual opposition, and I am happy to say that in every case I met with a most cordial and ready desire to meet my wishes. It would help us not a little, if the collectors and assistant collectors would, on all occasions when they visit villages on other duty, make enquiries as to the state of vaccination there; and at the same time impress on the people the importance of it; and examine the vaccination and small-pox registers, kept by the village officers; and see that they are kept with proper care and in proper form. Mr. Trevor, the first assistant collector at Nasik, I know from personal experience, does the latter, for I found in the Báglán táluká, which is under his charge, in almost every village I visited that, he had examined and initialled these registers. In the Kolába collectorate this department was in the

habit up to June of last year of receiving aid from police authorities when sought for under difficulties, and I have often had to thank their assistance for the reception of vaccination amongst communities of that district when other means failed to induce them to accept of it. About this time however Captain Payne, then acting superintendent of police in Kolába, seemed to think it no part of the duty of the police to give any assistance in the endeavour to protect the people from small-pox, and so issued instructions to his subordinates that they were for the future to forego the countenance they hitherto gave to vaccination. I was made acquainted with this fact by a communication from Captain Payne to the address of the Collector, Mr. Ovans, which was forwarded to me for perusal and remark by the latter. Neither the circumstance nor the communication seem to me however worthy of further remark in this report.

Tour.

14. At the opening of the official year I was in the táluká of Murbád where I examined the work of Jairám Rághú. I found it somewhat indifferent, and a testing of his register showed a good many errors more particularly in the result columns. Leaving this I proceeded to Shápur in which táluká I inspected the work and compared registers in 19 villages. The vaccinator's work was good and his register correct, but the village registers kept by the talátís were far from satisfactory. I next went to the Wádá táluká, with the work, &c. in which I was not at all pleased, and having pointed out means for improvement I passed on to the native state of Jawár. With the work here I was very well satisfied. I found no village vaccination registers were kept and on representing the fact to Mr. Robertson, the political agent, he ordered them to be undertaken by the talátís. In the beginning of May I left Jawár and travelled toward Dahánú inspecting the villages on either side of the way. The work was not altogether satisfactory, and as a result of my visit the vaccinator who was growing old and was of long service was recommended for pension which he has since obtained. From here I went to Máhim where I saw the work both of the táluká vaccinator and the dispensary, and wound up the month in the Bassein táluká examining the vaccinator's work, comparing the registers, &c. In June I took the office into Tháná and on the 4th of July I went on three months' privilege leave. On my return in October, I commenced the season on the 16th of that month by inspecting the work of the Salsette vaccinator in the neighbourhood of Ghorebandar, whence, having satisfied myself about it, I proceeded to Uran and saw the work of the municipal vaccinator and the dispensary with which I was satisfied,—and ended the month in Panwel examining the work of Bápu Bhikáji, with which I had every reason to be dissatisfied and I am happy to say the man has since resigned the service thereby saving me the necessity of recommending his dismissal. In the beginning of November I remained at Panwel to see how a young vaccinator, not long appointed, would carry on work, and for this purpose went with him to several villages and saw it fairly started. The remainder of this month I was occupied in examining the work of both the vaccinator and dispensary at Bhiwandi. After this Shahpur, and then, in travelling on to the Násik collectorate, Sinnar táluká, where I reached about the 1st December, and was joined by the Superintendent General of Vaccination. In December, I examined the Sinnar vaccinator's work which, was not at all good. Being a hand of some experience he should have done much better and was consequently heavily fined. A dispensary was recently opened at which I started vaccination. Leaving Sinnar we proceeded to the Sáwargáon táluká, where I found the work so-so, and the vaccinator scarcely to be relied upon. The dispensary work at Iolí was somewhat better, but the native doctor in charge of it, did not appear to be very bright, and seemed to have a hazy idea as to what was meant by a primary and what by a re-vaccination. Leaving this we went on to the Nándgáon táluká, thence to Chálisgáon, Pachorá, reaching Sendurni, Jámner táluká by the 1st January 1874. The work in Nándgaon was fair ; that at Chálisgáon good, and at Páchorá indifferent. The latter is a young vaccinator who lacks experience

rather than inattention, and I know he has been doing much better since my visit. Here the Superintendent General left me. In January I examined the work in the Jámner táluká with which I was not at all satisfied. The vaccinator, Mahipat Dharmáji, gave me a very poor opinion of his industry and attention, and it was only by fining him then, and repeating it since, that I have been able to get him into working trim. Leaving this I went into the Bhosáwal táluká where I found the lymph had been lost. The vaccinator here, Ganesh Somnáth, left on me very much the same impression as Mahipat Dharmáji, and shared the same treatment. From here I crossed the Taptí into the Sáwadá táluká, where I saw some very good work which had been done by Sitárám Sadáshiva, and then passed on to Chopdá, where things were not at all to my satisfaction. The vaccinator was a young hand whose work had never been seen by a superintentent before, so I had a good many things to point out for amendment which, I believe, has since taken place. In February leaving Chopdá I turned due west and still keeping north of the Tapí I visited the tálukás of Shirpur, Sháháde, and Talode; from this I turned south, crossed the Tapí again and went through Nandurbár; then Pimpalner and thence over the Selbári ghát into Báglan and Máligáon, which latter I reached on the 1st of March. The work in both Shirpur and Sháháde was satisfactory. In Talode it was not so, and chiefly owing to the difficulties met with in consequence of the extreme ignorance of the people. In Nandurbár things were not at all satisfactory. The man Mahádeo Bápuji was an old municipal vaccinator who had carried his old municipal habits with him of vaccinating only ten or twelve children a week. I however, pointed out to him freely, what would be the result of this course, and I am glad to say he has since shown some improvement. In Pimpalner I was satisfied with all I saw. In March I first saw the work of the Máligám vaccinator which pleased me, and leaving him I went into Báglán where I saw a good deal of the vaccinator's—Shivápá Lingáppá—work with which I was satisfied. From Báglán I crossed over to Iwantbárí ghát into Dindorí where I examined the work of the vaccinator and the dispensary. At the latter the work had just been set agoing by Assistant Superintendent Kisansing Dowlatsing and promised well. The vaccinator was ailing at the time of my visit—he has since died—so that there was some excuse for the backward condition of his fresh work. Leaving Dindori I went into the Penth state and examined the work of the dispensary and the vaccinator. I was quite satisfied with both. All I saw belonging to the dispensary was recent and very good. Of that of the vaccinator, I saw his fresh lymph, as well as a considerable quantity of the old cicatrices; and with all I was perfectly satisfied. Considering Penth had not been visited before by a superintendent, my finding the work there so satisfactory is creditable to the vaccinator, Hanumant Lakshuman. From Penth I went into the Násik táluká and examined the work of Krishnaráo Harí, a recently appointed vaccinator, with which I was satisfied. Leaving Násik I travelled on towards Igatpurí which I reached by the end of March when the official year came to a close. This tour occupied me something under 8 months, during which time I had 215 travelling days, made 109 encampments, travelled 2,288 miles, visited 494 villages, and inspected the vaccinations on the arms of 14,425 children, nearly all of whose names were called from the registers.

General conduct of establishment.

15. The assistant superintendents have all conducted themselves to my satisfaction during the year. There was no occasion offered for any one of them to distinguish himself so particularly as would call for special mention of his name here. Of the two additional assistants granted for this circle by Government Resolution No. 2783 of 7th August 1873, only one has been as yet appointed. The vaccinators have been somewhat troublesome during the year, as may be seen from the fact of my having to fine some 28 of them in varying sums amounting in the aggregate to Rs. 233-0-0.

EASTERN GUJARA'TH CIRCLE.

Superintendent.—Mancharjí Beramjí Colá, M.D.

Establishment.—4 assistant superintendents, 2 clerks, 25 vaccinators under local funds, 3 under municipalities, 18 under native states. Total 46 vaccinators and 20 dispensaries.

Popluation, 3,112,490. Total cost Rs. 26,091-6-2. Average cost of each successful vaccination 5 annas and 6 pies.

Establishment.	Years.	Total number of persons vaccinated and re-vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success, excluding those "unknown" from the total.	
			Increase.	Decrease		In primary vaccination.	In re-vaccination.
Local funds	1872-73	45,952	.....	.....	42,396	96·1	73·4
	1873-74	48,249	2,297	.....	44,234	95·0	71·1
Municipalities	1872-73	4,395	.....	.....	3,620	96·5	76·2
	1873-74	4,866	471	.....	3,771	92·9	52·6
Native states	1872-73	24,253	.....	.....	22,364	94·4	80·6
	1873-74	28,985	4,732	.....	26,846	94·7	66·6
Dispensaries	1872-73	3,606	.....	.....	3,250	93·9	48·9
	1873-74	3,484	.....	122	3,223	94·7	43·1

Changes in the circle.

When my last report was submitted there were three circles of vaccination in Gujaráth, viz., the Káthewád, Northern, and Rewá Kánthá circles. This arrangement continued up to the 1st November 1873 when certain changes occurred; and as in 1854, so again, Gujaráth is divided into two circles of vaccination, viz., the Western and Eastern Gujaráth circles; but there is this difference, Mahi Kánthá is now in the Eastern Gujaráth circle whereas in 1854 it was in the Western Gujaráth circle. Ahmadábád zilha and the native state of Pálanpur, both very populous and in which vaccination was well established, have been taken away from my circle, and Panch Maháls and Rewá Kánthá, both comparatively less populous and somewhat backward in vaccination, have been transferred to it.

Increase.

2. From the last printed annual report of vaccination I have taken the work of the several establishments which now constitute this circle and have drawn out the usual comparative statement at the head of this report: from which it will appear that, there is a small increase of vaccination by the local funds, municipal and native states' establishments and a very trifling decrease in the work performed at the dispensaries: but in the grand total there is an increase of 7,378. Taking the work of the zilhá establishments separately, as given in statement No. I., it appears that, there is a goodly increase in all districts, except Khedá, where the decrease amounts to 1,531. I am unable to state exactly the cause of this decrease; but the prevalence of small-pox in this zilhá, from December 1872 up to May 1873, may have caused parents to get the majority of their children vaccinated during the months when, the

Decrease in Khedá zilhá.

epidemic was most severe, viz., January, February, and March; and the disease protected the rest and so left comparatively little work for the vaccinators this year.

Total operations in circle.

3. Including the dispensaries, the total number of operations performed during the year is 86,273; of these 84,105 were primary vaccinations, and 2,168 re-vaccinations. The successful operations are respectively 76,891 and 1,183. Deducting the excess of operations over persons from the primary vaccinations, the total number of persons primarily vaccinated is 83,417, giving an average of 26·8 persons to every thousand of population.

4. The following figures show the particulars of sex, caste, age and success in the primary vaccinations and percentage of success in re-vaccinations :—

		Total numbers vaccinated.	Percentages.
Sex	Males	43,356	51·9
	Females	40,061	48·0
Caste	Christians	29	·03
	Hindus	72,148	86·5
	Mahomedans	5,589	6·7
	Parsis	326	·4
	Other castes	5,325	6·3
Age	Under 1 year	37,194	44·5
	Above 1 year	46,223	55·4
Success	Primary vaccinations	76,891	94·8
	Re-vaccinations	1,183	65·4

Lymph.

5. The lymph in use in this circle has generally remained good and active throughout the year. In the fair season almost all had good active lymph. During the rainy season six vaccinators reported the deterioration of their lymph; a few more spoiled their lymph through carelessness and inattention; and some lost it on account of sudden illness. The inspection-reports of the assistant superintendents are all favourable. During the year I inspected the lymph of 23 vaccinators and 2 dispensaries; of these the lymph of 4 vaccinators and of one dispensary was bad and the rest were working with good lymph. Two supplies of English lymph were received during the year; both were used by myself and failed completely. Requisitions for lymph from all quarters were complied with: and with the solitary instance of two supplies sent to the medical officer in charge Royal Artillery at Ahmadábád, having failed, no reports were received, regarding the result of the use of the lymph from any other quarter.

English lymph.

Small-pox.

6. In my last report, a short account was given of the small-pox epidemic in Khedá zilhá, which prevailed in January, February, and March of 1873. It continued during the following April and May, and had nearly expended itself by the early part of June. As mentioned at the conclusion of para. 12 of that report, a special narrative of the disease was submitted to the Acting Superintendent General, on the 7th June, together with a return of 2,389 cases of small-pox. Making some allowance for cases that did not come under notice, I estimated that at most 3,000 cases of small-pox occurred. This gives an average of nearly 4 cases per mille of population. The deaths recorded were 510 which gives 0·6 per mille of population. As many of the recovered cases as could be inspected, were examined and out of 1,879 cases

only 13 were found to possess marks of previous vaccination. The total of that return, containing particulars of caste, age, &c. is given below :—

Khedá Zilhá.	Population.	Number of cases of small-pox.	Caste.			Age.				Result.		Of those recovered.					Of those died.			
												Present during inspection.					Parents' statement.			
												Vaccinated.								
			Hindus.	Mahomedans.	Other castes.	Under 1 year.	From 1 to 5 years.	From 6 to 10 years.	From 11 to 20 years.	Recovered.	Died.	Marks.	No marks.	Vaccination and small-pox together.	Unvaccinated.	Absent during inspection.	Vaccinated	Vaccination and small-pox together.	Unvaccinated.	Unknown.
	782,733	2,389	1,466	571	352	453	1,218	531	187	1,879	510	13	114	10	1,692	50	35	11	406	58

From June up to the close of September, small-pox was absent from the circle —at least no reports were received from any quarter. In October a report was received from the Sankheda Mewás' vaccinator of the occurrence of solitary cases in two villages. During my present tour I found that small-pox, in a mild sporadic form, existed in a few villages of the native states of Bálásinur and Lunwádá in December and January. In February the disease made its appearance in Málpur, Mugodí, Pethápur, Dhaborá and Idar, which are all in Mahíkánthá. A few cases occurred in Jhálod in Panch Mahals. With the exception of a few cases in the town of Khedá, the disease was entirely absent from the zilhá of that name. In Cambay, in two villages lying on the banks of the Sábarmatí, the disease broke out pretty strong. And as I travelled through Chotá Udaipur, Sankhedá Mewás and Rájpiplá, I found that in all these districts the disease existed, scattered here and there in villages in a mild form; most so in Chotá Udaipur and Rájpíplá, two native states where vaccination is yet extremely backward. A few cases occurred in Broach city and in one village of Broach táluká. I was informed of the appearance of the disease in the town of Ulpád, Surat collectorate, and in one other village of that táluká. Though no information was sent to me, yet from personal inquiries, I found that small-pox had broken out in Bhodan and Tarkesar, and in Kurang and Varethi of Mándvi táluká. On the whole the existence of the disease was limited in extent and mild in character, and in almost all places the introduction of vaccination put a stop to it. It is worth while to notice here that, notwithstanding the occurrence of a pretty severe epidemic of small-pox in Khedá zilhá on the one hand and the city of Bombay on the other hand, from December 1872 to June 1873, Surat and Broach zilhás, though open to infection on both sides and from Gáíkawadì territories, have almost entirely escaped during the last and the present season. Whenever small-pox breaks out to any extent, careful inquiries show that the first cases occur in the early part of the cold season—about December—that it then gradually extends and increases as the hot season sets in, and gradually subsides after the setting in of the monsoon. During the months of heavy rain, viz., August and September, it is at its lowest degree and on the setting in of the dry cold weather it increases again.

Inoculation not practised in the circle.

7. I have not received this year any report of inoculation being practised in any part of this circle.

Vaccination in large towns not to be entrusted to dispensary officers only.

8. When, three years ago, our rural vaccinators were withdrawn from working in all towns which have a dispensary, and the vaccination of these towns was entrusted to the dispensary officers, for several reasons, I felt great doubt about the advisability of the step. At any time and under any person, the carrying on of vaccination in large towns is a work of difficulty. With an unnecessary amount of labor, and a great waste of time, a few children can only be vaccinated at a time. Even our vaccinators, who are expert operators and experienced men, accustomed to the drudgery work of hunting from house to house for unvaccinated children, and who feel that their daily bread depends upon their work, could not with all their tact and energy do much at a time: it was therefore, scarcely to be expected that hospital assistants, unaccustomed to this work, could cope with the many difficulties that existed in these places: and almost every where, it took no time, for such of the people, as were well-disposed towards vaccination, to find out the want of practical knowledge and skill of the dispensary officers. The natural consequence of this was that, an accumulation of unvaccinated children occurred in all large towns: and this happened markedly in Khedá zilhá. With two exceptions, viz., Balsád and Rándir, all the towns having dispensaries in Surat zilhá are small with a population of from one to four thousand inhabitants, and in them, the difficulty of finding out unvaccinated children is comparatively less. Similarly in Broach zilhá with the exception of Jambusar and Ankleshwár, all the other towns have a small population. But in Khedá zilhá—omitting Nariád which has a separate municipal vaccinator—all the others are large towns, having a population ranging from seven to fifteen thousand: in all of these, an accumulation of unvaccinated children occurred, and the result was that, small-pox broke out in them, to a severe extent. I would beg to recommend that the táluká vaccinators be allowed to carry on vaccination in such of the towns as have a population of 5,000 inhabitants or more without a municipal vaccinator.

No other than vaccine disease communicated by vaccination. Occasional sores &c.

9. Each year thousands of vaccinated children come under inspection, and the only ill effects that I have observed following vaccination are axillary abscesses and abscesses leading to deep ulceration in the site of the punctures; of such ill effects, during the seven years that I have been in the department, I cannot have observed more than about two dozen cases; and two cases, the worst of the kind, came under observation in the last month of the year under report, one at Poichá and the other at Hingoliá, both in the native state of Rájpiplá. The Poichá child was vaccinated a year ago, and all the children vaccinated from the vaccinifer including the sick child were examined. On none was any bad effect observable: even on the sick child the left arm bore beautiful and large vaccination cicatrices, whereas on its right arm a large abscess resulted which, not having been opened freely, the pus infiltrated into the tissues, discharging externally by a few minute openings. This state, existing for one year, had brought the child into a dangerous condition, and though I asked the parents to bring it to my camp (3 kos off) that I might lay open the abscess and apply some dressing, the parents did not do so. The second case was a girl seven years old vaccinated a couple of months ago. None of the children in the same village sufferred from any ill effect and this child's right arm was well; whereas all the three punctures on the left arm had formed into abscesses producing sinuses in all directions. The child at my request was brought to my camp where all the sinuses were freely laid open and some carbolic dressing was applied. I have observed no ill effects of any other kind which may be directly attributed to vaccination. Where thousands of operations are performed and that by non-medical men, a few such cases of ill effects must be expected. Of vaccine syphilis I have not observed a single case.

Small-pox after well marked successful vaccination.

10. As regards instances of small-pox occurring after unmistakeably successful vaccination, it will appear from the small-pox return the sum of which is given in para. 6, that out of a total of 2,389 cases, 1,879 were recoveries, of

these 1,829 cases were carefully examined and on 13 were found marks of vaccination, 114 though said to be vaccinated had no marks. Of the cases noted as having marks of vaccination, I have no exact entries as regards the quality of the marks, but I perfectly well remember seeing one or two children at Kapadwanj, and one or two at Nariád, bearing good marks of vaccine cicatrices and yet being laid up with small-pox; the rest had indifferent cicatrices. Going out of the circle I remember the case of a near relation of mine, a girl then about 10 years old laid up with severe small-pox in 1866 who was vaccinated in her infancy by an experienced practitioner; and more recently of a son of mine vaccinated successfully by Mr Anantá Chantrobá in 1867, then about 8 or 9 months old, laid up last March with a mild attack of small-pox. I think there is no doubt of small-pox occuring after unmistakeably successful vaccination—the frequency with which this occurs is a point that remains to be ascertained by the collection of statistics.

Vaccination gaining a hold on the people.

11. As in the previous epidemics, so in the last one, the estimation in which the mass of people hold vaccination, as a sure protective against small-pox was clearly proved by their requesting the attendance of a vaccinator or going themselves long distances to get their children vaccinated. In this circle, in almost all zilhás, portions of Gáíkawadí territory intervene, in which the state of vaccination, is not quite satisfactory: people from these districts often apply to our vaccinators, for the protection of their children; not only coming to Government villages with their children for vaccination but readily offering, from a quarter to half a rupee for each vaccination. There could be no better proof of the good fame of vaccination than this voluntary seeking for the prophylactic. In Panch Maháls vaccination is comparatively of recent introduction There is a village, by name Garorú, in Jhálod táluká, about 2¾ kos north of Jhálod, which did not permit vaccination for many years and I was informed that a zealous deputy collector promised the headman of the village that he would write to Government and obtain for him the privilege of cultivating a few *vingàs* of land free of assessment, if through his influence, vaccination could be introduced into the village: this plan did not even succeed: but a few year's after, seeing the example of the neighbouring villages, and perhaps having been taught a lesson by an epidemic of small-pox, this village subsequently accepted vaccination. To the north of this is another village, called Megharáj ná Khútá, beyond the limits of the Bombay Presidency. When, in March 1873, small-pox was prevailing elsewhere, the headman and others of this village solicited the Jhálod váccinator to vaccinate their children; but as this village was not in his charge, the vaccinator wrote to the Superintendent, Dr. Haliday, for permission to vaccinate them, which was readily granted. The Megharáj men brought all their village people to Garorú—young and old men and women, infants and children were all vaccinated at the same time. A promise was taken that, in case the assistant or superintendent of vaccination wished to inspect the vaccinated persons' arms, they were to come to Garorú for inspection. On the 1st of January of this year I inspected this work and asked the people why they underwent so much trouble to get the operation, to which they answered, that they knew from experience, the lives of their children would be safe from the dangers of small-pox.

Aid from revenue, political and village officers.

12. Taking the circle as a whole the vaccinators and the village officials worked in good harmony. As usual many complaints of a minor character, such as the non-filling-up of village notices, non-collection of children, objection of parents to submit their vaccinated children for inspection, or to allow lymph to be taken from them, were received. In the disposal of complaints of this kind the mámledárs can do much in a quiet way; but they are not as a rule, I think, zealous in the cause of vaccination; and in complaints where village officials are involved, my experience leads me to think that, as a class, the mámledárs incline to take the

side of the village officials; this is not unnatural, but the collectors and their assistants have consequently, often to be troubled with these small complaints: and I am happy to state that in such matters, material aid, was received from many district officers, civil and political, during the year under report: and what is of far more importance, collectors and their assistants, take a direct interest in vaccination, by making enquiries regarding the progress of it in their districts.

Tour.

13. The first part of the year I travelled through Khedá zilhá, where I instituted strict inquiries regarding the causes and extent of the small-pox epidemic. The vaccinators were dependent upon hap-hazard information; there were no proper means of knowing the places where the disease was prevailing. Through each táluká mámledár strict inquiries were made, and steps were taken to send vaccinators to the infected localities. By the commencement of June the disease was nearly stamped-out in every quarter. A special report of this epidemic together with a return of the small-pox cases was prepared and submitted to the acting Superintendent General, on the 7th June, as already mentioned. On the 13th June I arrived at my monsoon quarters. I was out again during the first week of November; which month was spent in travelling through Chorási, Ulpád and Ankleshwar tálukás, and in inspecting the several vaccinators' work. About the close of November, I left Ankleshwar for Anand, and from thence *viâ* Thásrá arrived at Bálásinur on 2nd December. It is unnecessary to state in detail the inspection work of each month. From December up to the close of the year I travelled through Rewá Kánthá and Panch Mahál. I specially undertook this journey with the view of acquainting myself with the men and of gaining some knowledge of the district that I may be better able to manage the vaccinators. The result of each vaccinator's inspection is contained in the monthly employment returns and it will be enough to state here, in general terms, that the state of vaccination in Panch Mahál and Rewá Kánthá was as good as in other parts of this division with two exceptions, viz., in Chotá Udaipur and Rájpíplá, where only certain portions of these districts were vaccinated, and the rest not attended to. Chotá Udaipur is an extensive state, and it is impossible for one man to manage its vaccination, besides the Darbár takes no interest in the matter. The whole of Rájpíplá has two men, and these happen to be brothers, who manage among themselves to vaccinate a tract of country all along the river Narmadá about 15 miles in breadth; the most southern part, the south-eastern and south-western Ságbárá and the hilly parts are not visited. Whilst travelling through Rewá Kánthá I had an opportunity of calling upon the political agent at Pánwad who promised to do his best to induce the Darbárs to promote vaccination.

Conduct of assistant superintendents and vaccinators.

14. All the assistant superintendents and the vaccinators have worked with zeal and have conducted themselves satisfactorily with two exceptions, viz., the municipal vaccinator of Nariád and the neighbouring vaccinator of Mátar táluká. The former has been ordered to be dismissed for his bad conduct the, latter's case is under investigation.*

* Has been dismissed the service since Dr. Colá's report was written.

WESTERN GUJARATH CIRCLE.

Superintendent.—Surgeon Major E. R. Butler, M. D.

Establishment.—3 assistant superintendents, 2 clerks, 2 vaccinators under Government, 7 under local funds, 5 under municipalities and 38 under native states. Total 52 vaccinators and 12 dispensaries.

Population 3,142,153. Total cost Rs. 24,421,-10-4. Average cost of each successful vaccination 3 annas and 11 pies.

Establishment.	Years.	Total number of persons vaccinated and revaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those unknown from the total.	
			Increase.	Decrease		In primary vaccination.	In revaccination.
Government	1872-73	3,177	...	...	2,749	90·7	62·5
	1873-74	4,380	1,203	...	3,361	92·4	42·8
Local funds	1872-73	13,067	...	...	11,814	94.3	91·1
	1873-74	13,512	445	...	12,033	94·1	78·6
Municipalities	1872-73	7,061	...	...	6,455	96·0	80·7
	1873-74	8,008	947	...	7,298	95·6	79·2
Native states	1872-73	87,415	...	...	80,772	96·1	70·9
	1873-74	82,775	...	4,640	75,118	96·0	77·9
Dispensaries	1872-73	1,679	...	...	1,462	92·7	92·8
	1873-74	2,578	899	...	2,284	91·8	76·7

The three principal subjects for report this year are:—1st, the union of the Ahmadábád collectorate and the Pálanpur states with Káthewád under the name of the Western Gujaráth circle:—2nd, the census having been taken the population was found to be much greater than that given in last year's report:—and 3rd, the large increase in the number of vaccinations at dispensaries in Kathewád. It is rather early to report upon the working of the Western Gujaráth circle, but I may mention that it is impossible to travel over the whole circle in one year; and I am afraid on this account, the Kathewád total of vaccinations, will not be so large as last year; for it is a patent fact that after the superintendent has visited a táluká the returns are always more voluminous.

Change in circle.

2. The lymph generally has been good, but the vesicles as a rule were small. The English lymph turned out well and the vesicles produced by it were of fair average size. I have distributed it all over the Ahmadábád collectorate and over a great part of Kathewád.

Lymph.

3. Three severe outbreaks of small-pox have been reported from the Dhanduká táluká, from Dhánk in Gondal and from Morvi. In Dhanduká it is still prevailing, the affected villages

Small-pox.

have been attacked by the two vaccinators and by the assistant superintendent, who much to his credit and praise, has thrown himself into the thick of it, and is doing good service in vaccinating the unprotected children. This outbreak was no doubt due to the laziness and illness of the late vaccinator, who, had not kept up his vaccination in these villages. The cause of the outbreak at Dhánk, may be attributed to the same cause. In 1872-73 I fined Maganlal Rs. 10 for not going to this very town; for two years after being fined, he carried his lymph towards the town, but when within a few kos reported himself sick and returned to Gondal. On the outbreak being reported, I started off the vaccinator who happened to be nearest the town and also the Gondal vaccinator. The first vaccinated all the chirdren unprotected, since which I have heard of no more cases of small-pox in the town. I have not received a report of the number attacked with the disease, but I hear from the assistant political agent at Gondal that many died; the outbreak was not reported to him till the whole town was more or less affected, and not till after the disease had been some time doing its deadly work. Since writing the above, I have received the report; 279 were attacked with small-pox and 40 died. The outbreak in the town ot Morvi was reported when it first commenced. The assistant superintendent Mr. Ranchoddás Mangaldás and the district vaccinator, who happened to be near, immediately repaired to the spot and very quickly put a check to its progress. 75 cases were reported but no deaths. Besides the above, several isolated or sporadic cases have been reported. I myself have seen no recent cases except in the above mentioned place, Dhanduká, where I was inspecting at the commencement of the outbreak.

Inoculation.

4. No inoculation has been reported except those I alluded to last year. I do not think any real obstruction exists to the spread of vaccination. I am of opinion that if there were a vaccinator in every village, and, the man had pleasant and kindly manners, every child over one month old might be vaccinated. The courtesy of the vaccinator has much to do with the success, the parents hate having the lymph taken from the children's arms, and it requires much persuasion to overcome this feeling. One vaccinator reported that the parents destroyed the vesicles with ashes to prevent the lymph being taken.

Irregularities in the vaccine disease.

5. During last rains many supplies of vaccine failed in parts of Kathewád. In Rájkote it was most remarkable. In July I examined the vaccinator's cases; one week, I saw six children with perfect vesicles, three of these children I picked out for propagation. All the children vaccinated from them resulted in failure. At the same time, I had several reports of a like nature. The weather was very close and hot and the rainfall very slight. I have not seen any disease communicated other than cow-pox. Before the outbreak of small-pox in Dhanduká, I noticed that after the 10th day many of the children's arms instead of healing and cicatrising showed signs of festering.

Small-pox after vaccination.

6. I only saw one case of small-pox after vaccination, and it was unmistakeable.

7. I have had numerous requests from different villages for vaccinators, proving that some of the people believe in vaccination.

Aid from Government officers.

8. I have always received great assistance from all the Government officers both political and civil. I may especially mention Mr. Borrodaile and Captain Phillips, the latter has visited many villages with me and personally explained to the people the objects and benefits of vaccination. I am also indebted to his assistance for the great increase in the numbers returned by the Gondal state dispensaries.

Tour.

9. I left camp on the 1st October and commenced my tour by visiting Gondal, on account of the assistant political agent having complained of the vaccinator not doing his work efficiently. The man does not do as much work as he might, he being old and in bad health. Besides, his charge is too large. Not that he has too many villages but many of them are very populous. From Gondal I travelled direct to Ahmadábád to take over the new addition to my charge. On my route I visited the Wákáner man's work, which was good, but the cicatrices small; he had made the punctures so close together that in many cases they had become confluent. From Wákáner táluká I passed on and examined the Sáelá man's work which, was very good; he complained of not having enough to do, so I gave him temporary charge of twelve villages belonging to the Wadwán man that had not seen a vaccinator for two years. About the middle of the month I passed through the confines of the Dhrángdrá táluká and examined the vaccinator's work; it was good, but there were many villages with unprotected children. From Dhrángdrá I proceeded to Wadwán; this man's work was good, but he had neglected to visit many of his villages. Early in November I inspected the Lakhtar man's work—the marks on the children were unsatisfactory. From Wadwán I proceeded to Limdi—the work in this táluká was good, most of the children had six good cicatrices. Thence I proceeded to the Veramgáon táluká. Some of the villages had not been visited for four years. The dheds and bhangis had not been vaccinated, most of the children were unprotected or had marks of small-pox. The vaccinator was on leave. In the month of December from Veramgáon I went to the Sánand táluká; here the work was good. The old and good work was done by a former vaccinator, the present man's work is disgraceful, the man is only fit for invaliding. Next I travelled through the Daskroi táluká. The work here was small in quantity and bad in quality. The present man had only lately arrived and attributed the number of unprotected children to the laziness of his predecessor, who is now at Prántej. From Daskroi I went to the southern part of Prántej where the state of things was equally bad. In January I visited the Dholká and Dhanduká tálukás—the work in both was good, and there were very few unprotected children in Dholká táluká; but in that of Dhanduká there were many unprotected, which was, the fault of the late vaccinator who was lazy and sickly. There were many cases of small-pox in this táluká. From Dhanduká I went to Ránpur, here there were many unprotected children but no small-pox. The late man had allowed his work to fall into arrears. From Ránpur I re-entered the province of Kathewád by Botád táluká; here I found Tulsi Gigá working with a will. The inhabitants had presented him with a testimonial signed by many hundred inhabitants. In the month of February from Botád I travelled through Jasdan;—here also I found good work being done—then on into the Rájkot táluká where Khusál's work was good and there were very few unprotected children; but the villages in Motilal's charge did not show so well, although an improvement had taken place since last year. On the 1st of March I proceeded to Ghotilá; the vesicles and lymph were very good and characteristic. From Chotilá through the Rájkot táluká to Jaitpur. The work done by the Jaitpur vaccinator in the early part of the year was much greater than that done by any other vaccinator and it appears to have been good work. From Jaitpur I travelled through Wallá, here the work was good, but the vaccinator had not visited his outlying villages. He was fined for this last year and will be again from this month's pay. I also examined Palitáná villages, in which the work was very good. The Shehor villages had not been visited by a vaccinator for a year. From Palitáná and Shehor I proceeded to the Gogo táluká, all the children appeared to be protected by vaccination in the villages I visited; work was very good. In April and May I travelled along the south-west and west of Kathewád, and examined the work done in the Bhánwád, Khambáliá, Jámnagar, Judiá and Dharol tálukás. The work done in the first was good, but there were a large number of unprotected childern. In Khambáliá the work was badly done and the man had been

demanding fees; he has since left the service. In Jámnagar the work was very good but many villages had not been visited during the year. In Judiá and Dharol the work was good and there were few unprotected childern. To sum up, I travelled through the Ahmadábád collectorate, the south-west and north-west, centre and east, of Kathewád; and from what I saw, with the exceptions mentioned, I believe the majority of the people were protected by vaccination, and that the vaccinators, as a body, were doing a fair average of work.

Conduct of assistant superintendents and vaccinators.

10. I have great pleasure in bringing to the notice of the Superintendent General the able assistance I have received from Assistant Superintendent Ranchoddás Mangaldás and Assistant Superintendent Sardármia Nánamia; they have done most valuable service in controlling the spreading of small-pox, as already mentioned. The vaccinators have on the whole worked well; there are a few exceptions. Most of them have suffered more or less from sickness, and I have found great difficulty in procuring men to act for them, indeed in many instances the breach has not been filled and has resulted in the loss of lymph, which has, in some places, been re-introduced with much difficulty; very many supplies of lymph in tubes having been destroyed in the post office by the stamping.

SINDH CIRCLE.

Superintendent.—Surgeon J. Williams, M.D.

Establishment.—6 assistant superintendents, 2 clerks, 43 vaccinators under local funds, 5 under municipalities and 2 under a native state, and 21 dispensaries.

Population 2,300,711. Total cost Rs. 32,538-4-11. Average cost of each successful vaccination 5 annas and 3 pies.

Establishment.	Years.	Total number of persons vaccinated and revaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those "unknown" from the total.	
			Increase.	Decrease.		In primary vaccination.	In revaccination.
Government	1872-73	288	.....	.....	276	100·0	100.0
	1873-74	.....	.....	288	.....	.....	.....
Local funds	1872-73	65,402	.....	.....	62,287	97·9	73·6
	1873-74	92,521	27,119	.....	85,879	97·8	79·5
Municipalities	1872-73	8,228	.....	.....	7,145	94·6	61·3
	1873-74	10,482	2,254	.....	8,963	95·3	72·3
Native states	1872-73	1,941	.....	.....	1,486	79·1	.....
	1873-74	4,331	2,390	.....	4,066	95·2	.....
Dispensaries	1872-73	2,455	.....	.....	2,194	93·7	72·7
	1873-74	3,790	1,345	.....	3,359	92·8	98·3

Decrease. There was no Goverment vaccinator engaged last year, hence the decrease of 288. There were 111,124 persons vaccinated against 78,314 in the preceding year, being an increase of 32,810. Of these 954 belong to the native territory of Jodhpur and 389 to Khilat state. The increase is due chiefly to increased exertion on the part of the assistant superintendents and the vaccinators, owing to the constant invasions of small-pox into nearly every part of Sindh; it is due also to the appointment of two additional assistant superintendents; to H. H. Mir Alimurad appointing a second vaccinator to work in his state and to increased efforts on the part of dispensary officers. Revaccination accounts for 5,433 of the increase, and after deducting those vaccinated in the territories of Jodhpur and Khilat, there remain 26,034 as the increase in primary vaccinations in this circle. Shown according to collectorates, the increase is distributed as follows:—Shikárpur 16,197; Thar and Párkar 4,559; Karáchi 4,093; Jacobabad 3,007 and Haidarábád 1,229. These figures remind me that Mr. Hássá Mal, assistant superintendent, was in charge of his district—Upper Sindh—for less than four months in the year previous; that Mr. Lál Baksh was in charge of the Thar and Párkar for six months only; and that two of the Jacobabad vaccinators were at work for some five months only in that year. This shows how valuable the above assistants have proved themselves to be. The increase seems pretty evenly distributed over caste and sex, but in point of age those "above 1 year" largely predominate. This is due to an effort

Increase.

having been made to vaccinate not merely as many as possible "under 1 year" but all above 1 year up to 15 years of age that were not, on inspection, found to be protected. Thus many who had been unsuccessfully or badly vaccinated before, were submitted to the operation again; the object being to have the whole population of the Province protected, so that vaccination might, in future, be confined chiefly to children "under 1 year." Though much has been done in this direction, there is still a good deal left, which I trust may be accomplished in the current year.

2. In the absence of accurate registration of births, it is impossible to say what number of children should be vaccinated annually. But taking the English birth-rate as a guide, there should be over 80,000 children born annually in Sindh and making an allowance for deaths in infancy, there would remain 70, 000 to 75,000 to be vaccinated.

Vaccination in Khairpur territory

3. The increase in the native state is apparently 2,390; but really should be 4,331, as the vaccinator's returns for the previous year were false *in toto*. Of the correctness of the past year's returns I am satisfied, as I examined his work in November last and received a satisfactory report from the assistant superintendent after his inspection at the end of the official year. Finding the children in his territory unprotected, H. H. Mir Alimurad appointed a second vaccinator, and I am glad to say they are both now working well. There is a large amount of work to be done too; for assuming that vaccination was not practised much for the previous ten years (which I believe is not far from the truth)there must be still some 30,000 unprotected, if they have not been protected by small-pox. This vaccinator's returns were false, because his work had never been inspected, and this, because he was not a Government servant; and I felt I had no right to enter foreign territory without special reason and permission; that intrusion on my part would be equally distasteful to His Highness and to Government. Some such feeling, I presume, prevented my predecessors from interfering. However, when I suspected the returns were false, I asked permission through the Political Agent, Colonel Dunsterville, to examine the vaccinator's work, and every facility and assistance were immediately given me. I now receive the returns on the condition that I may at any time—either myself or through an assistant—enter H. H.'s territory and inspect the work of the vaccinators.

Average Vacinations per Vacinator.

4. The average number vaccinated by each vaccinator in the whole of Sindh is decidedly a high one, viz. 2,146. The higest number that appears in Statement A No. I. is 4,920, but that is the work of more than one man. In June last small-pox broke out in Lárkháná when Mr. Assistant Superintendent Hásá Mál not only carried on vaccination himself, but called in the aid of two other vaccinators, hence the large number of persons vaccinated in Lárkáná. The next highest is 3,706 by 2nd grade vaccinator Nurmohomed, at Cháchrá, in the Thar and Parkar district; in this number are included the 954 Jodhpuris who asked to be vccinated. After this comes Sarupsing, 1st grade vaccinator Shikarpur zilha, with 3,652; this is in a measure due to Mr. Hásá Mal's assistance in stamping-out small-pox in the táluká of Saidpur. The lowest number is 223, in the Karáchi taluka and represents two months' work. The next is 917 in the Shikárpur táluká and represents 7 months' work. After this comes the total of 948 for Rámchand, 2nd grade vaccinator of the Karáchi zilhá at Mirpur Batorá; the smallness is due to Rámchand's idleness and absence from his táluká. He has since been dismissed. The majority of differences in the average ranging between 1,000 and 3,000 are explicable by differences in population, &c.

Sex.

5. Of the 99,644 persons primarily vaccinated, 56,903 were males and 42,741 females; a ratio of 57 males to 43 females. The proportion of males to females is a little greater than it was in the previous year.

6. Christians 157; hindús 15,853; musalmans 74,292; pársis 73; and other castes 9,269. The percentage of each compared with that of the preceding year is shown in this table—

Caste.

Year.	Christians.	Hindùs.	Musalmans.	Pàrsis.	Other Caste.
1872-73	·18	14·58	76·32	·12	8·77
1873-74	·15	15·91	74·55	·07	9·30

7. 38,924 were "under" and 60,720 "above" one year old. The number of children "under 1 year" vaccinated in the preceding year was 32,098, this gives an increase for the past year of 6,826: satisfactory so far, but leaves about half the number of children born during the year unprotected.

Age.

8. The percentage of success in primary vaccination was 97·5 and in re-vaccination 77·2: the corresponding figures for the previous year being 97·2 and 69·3. The degree of success in primary vaccination was pretty uniform: but in re-vaccination there was a considerable range, running from 21·8 to 100. If there were a column in the vaccinators' registers for entering cases of modified success, I believe we should be supplied with more reliable results of re-vaccination.

Result.

9. The quality of the lymph was found as a rule to be very good. I found it had deteriorated in three or four places and I had it replaced by lymph that was unquestionably good.

Lymph.

Two supplies of English lymph were received from the Superintendent General during the year. The one failed altogether and with the other 18 punctures made on 3 children, 5 vesicles resulted in one child. A tube of lymph had been used for each child. Several supplies of lymph were sent to Bushire in Persia and Goadar in Mekran during the year. The majority of them proved unsuccessful. Tube lymph seems to be useless in Sindh excepting in the cold weather; the heat apparently destroys its vitality.

English lymph.

10. The total cost was Rs. 32,538-4-11. Each successful vaccination cost five annas and three pies. There was an increase in the expenditure on account of the addition of two assistant superintendents, a second clerk, and a peon to the establishment. The two additional assistant superintendents were appointed in November and the 2nd clerk in February; the increase in cost caused by their appointments will be more than doubled in the current year, and if we assume that we shall have about 80,000 successful cases, the cost of each successful case will be between 7 and 8 annas. The cost of each vaccination in England is, I believe, over a rupee and a half which is more than six times the cost in this circle for the past year.

Expenditure.

11. As with the local fund, municipal and native state vaccinators, so there has been an increase in the work done at dispensaries. This increase has been more or less general, and is due, not merely to the dispensary officers having exerted themselves, but

Dispensary vaccination.

also to assistance given by the assistant superintendents when visiting a dispensary town : they collect as many of the children of the town as they possibly can for inspection, and having lymph at hand, there and then vaccinate all the unprotected they can find. Of 3,660 children primarily vaccinated, there were 2,264 males and 1,396 females : a ratio of 61·86 males to 38·14 females. The proportion in the tálukás of males to females is about 5 per cent. less. There were about 18 hindús to 17 musalmans, whilst last year they were in the ratio of 11 to 13 respectively : this seems to be a good sign, as showing that the hindús avail themselves more freely of vaccination than they formerly did. About one-third of the number vaccinated were "under one year." The percentage of success is low (92·8), owing, in some measure, to failures with tube lymph. One hundred and thirty persons were re-vaccinated.

Small-pox.

12. Vaccination was very severely tried during the past year. The invasions of small-pox were incessant. It was at different times introduced from Bháwalpur on the north, Belochistan (Khilat) on the west and Katch on the south, and it was brought by boat from Bombay and Katch, and from Matra near Muscat in Arabia. It was introduced into the Karáchi, Shikárpur, Jacobábád, and Thar and Párkar districts, but into border tálukás or towns only, if we except Saidpur and Lárkháná. The Haidrábád zilhá being central escaped entirely. In the month of April it was prevalent in the tálukás of Ghorabári and Shahbandar. It was introduced into Karáchi town by a boy from Kútch ; into the tálukás of Nasirábád and Jacobábád from Khilát ; into Saidpur from Bhawalpur and into Dipla in the Thar and Párkar from Katch ; but it was immediately extinguished in the latter district by assistant superintendent Mr. Lál Baksh. In May it was introduced into Obaoro from Bháwalpur. In June it was introduced into Lárkháná and Kambar from Khilat and extinguished in Jacobábád and Nasirábád. In July it was extinguished in Shahbandar. In August it re-appeared in Shahbandar and was extinguished in Lárkháná and Obaoro. In September it was extinguished in Ghorabri and Shahbandar and introduced into Jati by the Sír creek from Katch. In October the disease appears to have been quiescent every where. In November it re-appeared in Shahbandar and one case occurred in Ghorabari. In December it seems to have finally disappeared from Ghorabari. Owing to its severity in Karáchi, Khilat, the people of the town of Shahpur asked the political superintendent of Frontier Upper Sindh that they might be vaccinated, and the Jacobábád vaccinator was sent by Colonel Loch to work amongst them. In January the disease was extinguished in Shahbandar and introduced from Khilat into Thul in the Frontier Upper Sindh. In February it was introduced again into Obaoro from Bháwalpur and extinguished in Thul. In March it was introduced into Nagar Parkar from Katch and from Suigám. During the year there were 58 deaths from small-pox, viz., 27 in Ghorabári, 10 in Shahbandar, 10 in Karáchi town and 5 in Jati in the Karáchi collectorate ; and 1 in Saidpur, 2 in Obaoro, 2 in Kambar, and 1 in Lárkháná in the Shikárpur collectorate. The large number of deaths in the Ghorabári and Shahbandar tálukás, I attribute entirely to the indolence of the two vaccinators, who had been placed in charge of them, viz., Parmánand and Watanmal, both of whom were discharged during the year. This district was unfortunate also in as much as its assistant superintendent was ill for two or three months. The greater number of deaths in Karáchi did not occur in the town exactly, but in a "nest" of fishermen lying somewhere between the town and the harbour, and at no great distance from Baba island. The two municipal vaccinators have been working very hard and deserve great praise. That the disease should have been so promptly suppressed in the Shikárpur zilhá, is due entirely to the ability and energy of assistant superintendent Mr. Hásá Mal. Vaccinator Sarupsing also worked admirably in Spaidur. Just now (April) the disease is prevalent in the táluká of Jati, where assistant superintendent Mr. Gangaram has been placed. This táluká is in immediate communication with Katch both by land and sea, and it is chiefly in the neighbourhood of Sirbandar and in the villages on the high road to Lakpat that the disease has

shown itself. One of the deaths that occurred in Jati and one of the two in Obaoro were of people who had been inoculated.

No disease but cow-pox communicated by vaccination.

13. There is not a single instance of any disease other than the cow-pox having been communicated by vaccination.

Tour.

14. In April and May I was engaged in the Shahbandar and Jarak divisions testing the vaccinator's work, inspecting villages and tracing out small-pox to its orign. I found the disease in the tappa of Bablo, in the táluká of Shahbandar, where it had been brought by a woman who had been ill of it at Ketibandar. The villages on the island between Bablo and Keti were full of the disease. In Keti itself the disease had existed several months, but the hospital assistant then in charge of the dispensary had done nothing to suppress it, and told me that it "had not been brought to his notice." However the present hospital assistant, Mr. Francis Jacob, has worked very hard and successfully at vaccination. I vaccinated in all the villages I went to, with tube lymph, and left assistant superintendent Mr. Lachman in special charge, as the vaccinator Parmánand had just been dismissed. I then roused up 2nd grade vaccinator Watanmal to his work, for he had been apparently asleep, though he must have known that he was literally surrounded by small-pox. He worked very well for a few weeks, but as the Indus was rising, and the country about to be inundated, Watanmal betook himself to Mirpur Sacra, contrary to my instructions, and ultimately he was allowed to resign. I afterwards inspected the work of the Tattá vaccinator, and sent him to Mr. Lachman's assistance. I visited the Tattá dispensary, where Mr. Apothecary Sylvester had vaccinated a large number of children. I then visited the Jarak dispensary and a considerable number of children were vaccinated in my presence, by hospitatal assistant Mr. Kisansing. In October I visited Bulákhán Tándá dispensary and then marched up the left bank of the Indus accompanied by assistant superintendent Mr. Asumal through the Halá and Naoshero districts, visiting the Halá and Tharushá dispensaries and inspecting the work of the Halá, Shahdádpur, Sakrand, Morá, Naoshero and Khandiara vaccinators. I found all pretty satisfactory, excepting the work of Khanchand, whom I had to recommend to be dismissed. At the Northern boundary of the Haidarábád zilhá I was joined by assistant superintendent Mr. Hásá Mal, and then entered H. H. Mir Alimurad's territory and inspected the work vaccinator Ghaus Baksh had done since the month of April. He had no other to show. He had very good lymph and every thing pretty correct for what I may term a beginner. His Highness appointed another vaccinator, Hakikat Rai, who was formerly employed in this office as a clerk, and who is a native of His Highness' territory, so that vaccination is progressing with rapid strides now in his state. I then went over to the eastern portion of Rohri to inspect vaccinator Lokumal's work; afterwards marched to the Rohri town, visited the dispensary and had to suspend operations by the hospital assistant in charge, pending an investigation into some charges made against him by the Panchayat. The táluká vaccinator was directed to carry on vaccination in Rohri town in the meantime, as well as in the taluka. I inspected the lymph at Sakkar. Next I went up through Saidpur and Ghotki to Mirpur Mátelo and Obaoro, specially examining the work done by vaccinator Sarupsing and Mr. Hásámal in May and June, when very large numbers were returned as vaccinated. Every name returned was perfectly correct, but the work was not in every instance as good as it should be owing evidently to attempting to do too much. To make over 900 vaccinations in one month is no easy task, but it was done, and the object with which it was done was accomplished, viz., to stamp-out small-pox. The lymph in Mirpur and Obaoro was not so good as it might be, so I directed the two vaccinators to take supplies from Sarupsing, who had splendid lymph. Having got up as far as the Bháwalpur territory, I crossed the Indus to the Upper Sindh Frontier districts,and inspected the work of the vaccinators of Kasmor and Thul. I considered they had not done sufficient work and explained this to them. I went on to Jacobábád, Shikarpur and Sakkar, inspecting the work in

the towns and talukas. Thence I worked my way through the Naoshero, Rátáderá, Larkháná, Kambar, Nasirábád, Mehar and Kakkar talukas into the Karachi collectorate; visiting the Larkháná and Mehar dispensaries *en route*. Continuing my march down the right bank of the Indus, I inspected the work of the Dadu, Sihwán, Mánjhándá and Kotri vaccinators and visited the Sihwán dispensary. In the latter part of January, I went across the Haidrabad collectorate to the Thar and Párkar, examining by the way the work of the Haidrabad municipal and taluka vaccinators, of the Alayar and Sháhdádpur vaccinators, then taking the course of the Nárá and Puran rivers to the Ran of Kutch, I inspected the work done in the Sánghar, Kiprá, Umarkot and Dipla talukas and visited the Kiprá and Umarkot dispensaries. From Rahimki bazár I entered the southern portion of the Haidrábád collectorate, traversed the Badin, Baga-Ka-Tánda, and the Guni talukas, and at the end of March was in the Shahbandar district, in the neighbourhood of which, owing to the prevalence of small-pox, I intend remaining for some time, in order to ensure work being done as well and rapidly as possible. From Statement No. VII., I find that I travelled 2,822 miles, visited 532 villages and inspected 20,925 vaccinated children. From the vaccinators' registers I called 6,595 names; of these there are only 20 names unaccounted for, and I cannot say that even one of these is a false entry: they are the names of children whom the patil cannot identify as belonging to his village. Ten of them were entered as belonging to the village of Jungo Jalbani in the Shahbandar taluka, and as the man who had returned them was not present to explain matters (he having been transferred to another part of the zilha in consequence of a resident of Shahbandar having been recently appointed to this taluka), I had no alternative but to put them down as unaccounted for. They were probably the children of people who had temporarily taken up their abode near the village of Jungo Jalbani.

Correctness of vaccinators' returns.

15. If we except the vaccinator of H. H. Mír Alimurad in the Khairpur territory, who has "turned over a new leaf," I have found but one instance of falsification, and that on a very small scale. The case is that of Ramchand, vaccinator in the Mirpur Batora taluka, who having been idle during the inundation season, in order to make his returns appear better, dared to enter the names of some half dozen children in the return for October that had been already given in the return for September. Rámchand has just been dismissed in consequence. Every vaccinator is aware that for the least falsification he is liable to be dismissed, hence we have very few instances of such cases.

Conduct of vaccinators and assistant superintendents.

16. Speaking generally, the vaccinators have behaved exceedingly well and have worked very hard: but there are two or three who reflect no great credit on the Department. The assistant superintendents have worked exceedingly well, as is evinced by the amount of work done in their districts. Mr. Hásámal and Mr. Lál Baksh are especially deserving of praise. There was no small-pox in Mr. Asumal's district; he had not therefore the same opportunity of distinguishing himself; but notwithstanding this he has done excellent work. Mr. Lachman failed during the year owing to sickness, he has not been so successful in coping with small-pox as Mr. Hásámal or Mr. Lal Baksh.

Aid of civil and political officers acknowledged.

17. I have much pleasure in recording that I have received every assistance from all the authorities in carrying on my work. This has made my duties comparatively agreeable. I am under great obligation to the Commissioner in Sindh, Sir W. Merewether, for his invariable kindness in helping and advising me. I am also much indebted to Colonel Dunsterville, both as Political Agent of Khairpur and as Collector of Haidrábád. My thanks are due to Mr. Douglas Crawford for so successfully using his influence with the people of large towns in his district in favour of vaccination; to Captain Mayhew who, accompanied me through the whole of his district in search of small-pox; and to Mr. Tyndall for special assistance at the dispensary towns of Tattá and Jarak.

KUTCH CICLE.

Superintendent.—Dorábji Hormasji, G.G.M.C.

Establishment. —1 assistant superintendent and 11 vaccinators.

Population 486,900. Total cost Rs. 2,319-11-10. Average cost of each successful vaccination Rs. 1-0-3.

Establishment.	Years.	Total number of persons vaccinated and re-vaccinated.	Compared with the preceding year.		Successfully vaccinated.	Percentage of success excluding those "unknown" from the total.	
			Increase.	Decrease		In primary vaccination.	In re-vaccination.
Native state.....	1872-73	1,932	.....	.....	1,791	94·3	88·8
	1873-74	2,476	544	.....	2,273	93·9	57·1

Progress.

In submitting the annual report of vaccination for the year 1873-74, it gives me satisfaction to observe that there has been some progress made during the year under report. The total number of vaccine operations was 2,476, while during the previous year it was 1,932, thus giving an increase of 544. Though the number of operations performed in this circle is very small when compared with other circles, yet considering the difficulties the vaccinators have to go through, the progress made during the last year is a hopeful sign. Of the total 2,476 vaccinated, there were 2,468 primary vaccinations and 8 re-vaccinations.

Sex.

2. 1,260 were males, and 1,208 females.

Caste.

3. 1,698 were hindus, 768 musalmans, 1 christian and 1 pársi.

Age.

4. 484 were under and 1,984 above one year of age.

Result.

5. The result was, 2,269 were successful, 147 unsuccessful and 52 unknown.

Re-vaccination.

6. Of 8 cases of re-vaccination, 4 were successful, 3 unsuccessful, and 1 unknown. The percentage of success was 57·1.

Cost.

7. The cost of each successful case was Rs. 1-0-3 which was less by Rs. 0-3-2 than in the previous year. I may here remark that in consequence of a long pending dispute between His Highness the Ráo and his relations, called Bháyáds, vaccination is conducted in Kutch under two heads. One set of vaccinators is paid by His Highness and they vaccinate in Darbár towns and villages. Another set is paid by the Bháyáds and they go round vaccinating in villages belonging to the latter.

8. Kutch, though a small province, has 868 villages, mostly, thinly populated ; of which 520 belong to the Darbár and 348 to the Bháyáds. According to the census of 1871, the Darbár population consisted of 302,254 and that of the Bháyáds of 184,646, giving a total of 486,900. On finding an average population for each village, it comes to 561 souls.

Population.

9. During the early part of the year under report, the establishment consisted of 9 vaccinators, but their number was subsequently increased to 11 and one assistant superintendent. His Highness employed 1 assistant superintendent and 6 vaccinators. Of the latter, three were located in the biggest towns of the circle, viz., Mándvi, Bhuj, and Mundrá ; the remaining three moved about. The acting assistant superintendent acted as such in the latter part of the year only, but was acting as a vaccinator for the previous time. 5 vaccinators were employed by Bháyáds.

Vaccine establishment.

10. The work done under each of the above divisions was as follows :—

Darbâr towns and villages.	Primary vaccination.	Re-vaccination.	Total.
Bhuj dispensary	310	2	312
Mandvi Do.	196	.....	196
6 Vaccinators	1,242	4	1,246
Total	1,748	6	1,754
Bhâyâd towns and villages.			
1 Terâ vaccinator	108	2	110
1 Roá Do.	258	.....	258
1 Berája Do.	201	.....	201
1 Mothàra Do.	12	.....	12
1 Nangrichà Do.	141	.....	141
	720	2	722

11. The chief difficulties the vaccinators meet with, consist in the religious prejudices, ignorance, and apathy of the people. They have a belief in a deity called " *Shitalá Máta* " who presides over small-pox. Their belief is, that for some crime or fault of the parents, the children are made to suffer, and the wrath of the deity is shown by attacking them with small-pox, with more or less virulence in proportion to her anger. In order therefore to appease her wrath, they try all their means to keep her satisfied with them. For this purpose they observe two days in a year called " *Siri Satam* " and " *Shitla Teras.*" On these days all the parents with their children go to the goddess, present her with certain sweetmeats and bow before her, with the object of obtaining her mercy in keeping their children

Difficulties.

free from small-pox. On these days they do not partake of any newly cooked article, but live on sweetmeats or other articles prepared on a previous day. Notwithstanding all this, if their children happen to be attacked with small-pox, they again, on the 7th or 9th day of the attack, go to the goddess and perform the above ceremonies. They have so much faith in her, that even after their children are vaccinated, on the 7th day they proceed and offer certain articles to her. Such children as do not suffer from small-pox are considered under the protection of the goddess rather than of vaccination. With such a firm belief in the deity they treat vaccination with contempt and consider it as a curse rather than any good. With such ignorance and apathy, the vaccinators find it very difficult to get on : all sorts of devices are practised to escape vaccination. As soon as it is known a vaccinator is going to a village, many will either lock up the doors of their houses, giving one to understand that nobody is in the house, or conceal their children in big earthern pots intended to hold grain, or in some cases they run away to some of their relations in a neighbouring village. This difficulty can only be removed by one of the two following ways, by allowing them time to become more civilized and to see the advantages of vaccination or by making vaccination compulsory.

12. The complaints from vaccinators were generally of two kinds : one was about opposition to vaccination from the people, and the other about not getting their allowances. Such complaints when received were brought either to the notice of the darbár or the Political Agent, according as the subject belonged to His Highness or to the Bháyáds. Orders were issued from one of the two sources, advising the people to get their children vaccinated and that the vaccinators be paid their allowances. In this way much valuable time was lost and in consequence of such delays vaccinators often lost lymph which required to be re-supplied. All this was attended with waste of time and as a natural result the progress of vaccination was slow.

Salaries of vaccinators.

13. The vaccinators were paid regularly every month by His Highness according to fixed rates. While they were travelling, they were allowed a pony or camel, and a peon each. A vaccinator, when he went out of Bhuj, was allowed to draw from the local funds of each village Rs. 0-14-0 per day to cover his and his peon's batta, and pony feeding, as long as he stopped there for the purposes of vaccination. This arrangement formed one of the obstructions in the way of vaccination as described in the last para. In order to remedy this, I have to bring the subject to His Highness' notice and suggest a different arrangement for the current year in the following way, that instead of collecting funds at a time when a vaccinator is working in a village, such funds should be collected from each village, in the beginning of each year by darbar servants and that the vaccinator should be paid his travelling allowances along with his pay by the darbár instead of by the kámdár or pátil of each village. The same suggestion will be made to the political agent for making a similar arrangement for the Bháyáds' vaccinators. When this difficulty is removed, the vaccinators will have only to contend with the religious prejudices and ignorance of the mass of the people.

Animal vaccination.

14. In November, while Surgeon R. M. Wall was in charge of a portion of a native regiment here, he having had some experience in animal vaccination, expressed his desire to the Political Agent to introduce it into Bhuj. The latter wished me to arrange for a calf, and accordingly the first heifer was inoculated on 19th November with lymph obtained by Dr. Wall from Mr. Anantá Chandrobá, Bombay. Subsequent to this inoculation of calves and vaccination of children were conjointly carried on by Dr. Wall and me till 15th January ; but on his departure to Bombay shortly after, the work was conducted by me. The result of the work for four and a half months was that 22 calves were inoculated and 152 children vaccinated. Of the

latter 97 were successful, 40 unsuccessful, and 15 doubtful. The following table shows the work of each month with results —

Months.	Calves inoculated.	Primary vaccination.				Re-vaccination.			
		Successful.	Unsuccessful.	Doubtful.	Total.	Successful.	Unsuccessful.	Doubtful.	Total.
November	3	....	2	1	3	...	...	...	...
December	5	25	4	1	30	...	...	...	...
January	5	48	4	..	52	...	...	1	1
February	4	14	21	10	45	...	1	...	1
March	5	10	8	2	20	...	...	...	...
Total...	22	97	39	14	150	...	1	1	2

Animal vaccination opens one great advantage to the people, in there being no necessity to take lymph from the arms of the children, but it has one disadvantage in that it is attended with many failures as is shown by the above table. Such is not the case when lymph is used from arm-to-arm. The percentage of success in animal-lymph was 71·3, while in human-lymph it was 95-2.

Lymph.

15. The lymph used throughout the year was reported to be good. After the rains, a fresh supply was sent for from Kathewád and Bombay; the former proved unsuccessful and the latter successful. Two tubes of English lymph were received from Dr. Pinkerton, of which one was used in inoculating a calf and the other in vaccinating a child; the former proved successful and the latter failed. Lymph was supplied to the Bhuj regimental medical officer. The vesicles observed were well developed and good.

Small-pox.

16. During the latter part of the year under report, small-pox was prevailing to a considerable extent. No reports were received of any vaccinated persons having been attacked by small-pox.

Inoculation.

17. The practice of inoculation in this province has not been noticed for some years past.

No other disease than cow-pox communicated.

18. Not a single case came to my notice in which any other disease was communicated by vaccination than the cow-pox. The only *ill* effects observed, which were very rare, were ulcerations at the site of the vesicles in consequence of the children scratching them and the parents not taking proper care of them.

Protective power of vaccination.

19. During the last epidemic of small-pox, though the persons who were vaccinated were in the midst of others suffering from small-pox, yet there were no reports of the former suffering from it. This in itself is a sufficient proof of the protective power of vaccination against small-pox.

20. Thanks are due to Captain G. R. Goodfellow, the acting Political Agent, for the ready assistance given in the cause of vaccination whenever wanted throughout the year.

Aid from Political Agent.

21. The assistant superintendent, who in the early part of the year was vaccinating himself (in consequence of having very little to inspect), submitted certain forms which give the following result :—Out of the 79 darbar villages vaccinated, he inspected 51 villages, which, together with 22 vaccinated by himself, give a total of 73 villages having come under his observation. He inspected 413 vaccinated children which with 382 vaccinated by himself, give a total of 795 seen by him. He did not hear of any complaints from the people about misconduct or harshness of the vaccinators, nor did he see any children suffering from small-pox who had been vaccinated. He was not able to examine all the children vaccinated in consequence of his being in a hurry to inspect all the villages, as he commenced his tour rather late. He is asked to commence it earlier during the current year, and a fuller account will be rendered.

Tour of assistant superintendent.

21. One assistant superintendent and 3 vaccinators were newly appointed. Out of the latter, two were added by the durbar and one by the Bhayáds.

New appointments.

22. The conduct of the assistant superintendent and vaccinators was good with the exception of two, who were fined one-sixth of their salaries for not carrying out instructions properly.

Conduct of the assistant superintendent and vaccinators.

EXTRACTS

FROM THE

REPORTS OF CIVIL SURGEONS AND DISPENSARY OFFICERS.

AHMADNAGAR CIVIL HOSPITAL.

Surgeon-Major H. T. Dann, B.A., Civil Surgeon.

Population 32,841

Vaccination was performed very assiduously in the civil hospital dispensary during the year under report, and with, I am happy to say, very good success, as will be seen from the absence of failures. 72 children of all ages were vaccinated, all of them proved successful. 46 male and 26 female children were vaccinated. In rare cases the children vaccinated were not presented by their parents punctually on the 8th day (although the result was afterwards known), and consequently I had occasion to receive lymph from the municipal vaccinator to continue the usual operations. This year there was no appearance of small-pox.

SHOLAPUR DISPENSARY.

Mr. Narsu Gurappa, 2nd Class Hospital Assistant.

Population 53,403.

The number of persons vaccinated during the year was 572, being an increase of 58 above that of the last year. Of these 283 were males and 266 females. There were 2 christians, 408 hindús, 132 musalmans, 1 pársi, and 6 other castes. 289 being under and 260 above one year old.

2. In 564 primary operations, 524 were successful, 32 unsuccessful and 8 unknown. 15 of the unsuccessful were vaccinated twice as the first operation proved unsuccessful.

3. There were 23 persons revaccinated during the year. They were all males. The operation in 13 proved successful and in 10 unsuccessful and doubtful. The lymph used was good. The vesicles were normal and of the size of a grain of pulse.

4. Vaccination does not appear to be progressing rapidly in this town. Although the children are operated upon at the dispensary, still I and the native medical pupils go about the different parts of the town and induce people to get their children vaccinated. The brahmins seem to be the only caste that voluntarily bring their children to the dispensary or ask me or the municipal vaccinator to go to their houses to vaccinate their children. The other castes are still unwilling to subject their little ones to the operation of the lancet. What they dread most is taking the lymph from the vesicles on the eighth day. Even the most intelligent try to avoid this.

5. I am glad to state that no measles or small-pox prevailed during the year under report.

6. The average number of weekly operations was 11.

MAHABLESHWAR.

Surgeon-Major George C. Bell, M.D., Superintendent.

Population 4,006.

During the season under report vaccination was successfully practised in every case that presented itself. The most favorable months for vaccination are April and May, and I may here remark that after careful observations for some years, it may now be regarded as an established fact that on this range of hills the results are more successful if attempted after the hot season commences, very few proving successful during the cold months. Lymph in tubes was obtained on three different occasions from the superintendent of vaccination, central circle which proved active and good. In all 38 operations were performed; in these, 3 were excess of operations over persons, and 35 were individuals primarily vaccinated, 13 males and 22 females; 21 being under one year and 14 over a year old; result of the total operations was 22 successful 14 unsuccessful, and 2 unknown.

VENGURLA DISPENSARY.

Apothecary Mr. D. M. Munday.

Population 10,618.

The total number vaccinated was 228, viz., males 133, females 95; of which 147 were under one year and 81 above one year old; 221 proved successful, 4 unsuccessful and doubtful and 3 unknown giving a percentage of 98·2 of successful cases.

2. Vaccination has been performed by the native medical pupil attached to the civil hospital at the station in the presence of the apothecary in medical charge of the civil station.

3. There has been an increase of 55 in the number vaccinated compared with the previous year, owing to the assistance rendered by the mahalkari of this place who gave stringent orders to the pátils to assist with the register of births and on all occasions to accompany me from house to house, and persuade the parents of the children to allow the operation to be performed. In a short time there will be no means of keeping up vaccination constantly, for all will be protected by vaccination. Hitherto nothing but an epidemic of small-pox in the neighbourhood has induced the richer class or Gujars to allow their children to be vaccinated. Improvement might be made if vaccination were made compulsory, but as it is not compulsory many children are not operated upon until they are over one year old, owing to the obstinacy of their parents. Our system is to go from house to house in all parts of the place and vaccinate all that can be found unprotected of all ages.

4. There has not been an outbreak of small-pox.

5. Revaccination is positively objected to by all classes.

DA'PULI DISPENSARY.

Honorary Surgeon A. Pollard.

Population 8,177.

During the year 1873-74 there have been 363 vaccine operations in Dápuli, and in the villages in the neighbourhood, all of which have been primary operations. Of this number 24 persons were operated on twice each, so there were 339 persons operated on. 185 were males and 154 females. As regards caste or religion, 4 were christians, 279 hindús and 56 musalmans. 119 were under one year old and 220 above that age. 331 were succesful, 29 unsuccessful or doubtful and 3 unknown. Compared with the year 1872-73 there has been an increase of 29 persons operated on, with more success, the percentage of successfull operations in 1872-73 being 81·0 against 91·9 in 1873-74. The three unknown cases had left the village between the time of operating on them and the 8th day following and who could not consequently be seen.

2. I do not think there is such difficulty experienced lately as there used to be, in obtaining subjects for vaccination, especially in the villages and hamlets about the country, but there are still some difficulties in Dápuli where brahmins, vakils, karkuns, kotes &c. reside and they object to have their children vaccinated, and make all sorts of excuses: but occasionally there are some who come and request that their children may be vaccinated; however this is certainly the exception, and it need not be said that their request is at once complied with; I trust ere long I shall be able to say that this is the rule instead of the exception.

3. Vaccination has been carried on slowly but steadily throughout the year, some few children being operated on weekly, that a supply of lymph may be always available should any demand arise for it. My dispensary servant having been taught to vaccinate, is sent in different directions within a moderate area, and according as his services can be spared to the different villages and hamelts around Dápuli, and if at a convenient distance I generally examine his work, if too far and out of my range, the assistant superintendent or the superintendent of vaccination makes it a point of doing so at their visits; were I not to do this, I would not be able to vaccinate many as the village of Dápuli with the camp contain but a small population; altogether from this source only 79 children have been obtained during the past year.

4. The several villages visited by myself and dispensary servant for the purpose of vaccination during the past year, are given below together with the population as taken in last census, but how far the numbers can be depended on I am unable to say. I cannot say whether or not any of those villages have been visited by any local fund or other vaccinator during the past year, but at the time of my visiting them all the children that could be got were operated on.

Dápuli camp and village	2,808	population.
Jimona	976	„
Asuth	1,219	„
Jalgaum	1,739	„
Wanand	423	„
Sarang	1,012	„
Total ...	8,177	„

5. I have not had any reports made to me of small-pox epidemics in any of the surrounding villages during the year under notice.

KARWAR CIVIL HOSPITAL.

Surgeon S. J. Goldsmith, Civil Surgeon (acting).

Population 13,263.

The number of vaccinations performed at the civil, police, and jail hospitals and by the dispensary officer in the municipal towns is as follows :— Civil hospital 46, police hospital 127, jail hospital 98, and in the municipal towns 524. This includes both primary and revaccinations. The 113 vaccinated at the charitable dispensary are not included in this return, but will be shown in a separate one.

2. The number of cases of primary vaccination was 558; of these 288 were males and 240 females ; there being an excess of 30 operations over the number of persons vaccinated ; the percentage of successful cases excluding those " unknown" from the total, are 82·0, out of these 114 were christians or 21·6 per cent., 390 were hindus or 74 per cent. and 24 were musalmans or 4·5 per cent.

3. The number of revaccinations was 237, of these 83 were successful or 35 per cent. and 154 unsuccessful.

4. In most of these cases arm-to-arm vaccination was practised ; in only a few was tube lymph used, but this method was employed almost entirely in the jail, as the mothers have a slight objection to take their children there, which would however I think be easily got over by giving them a small remuneration.

Quality of lymph.

5. The quality of lymph from what I have seen was good and the vesicles were large and well developed.

Small-pox.

6. During the twelve months under record parts of two epidemics have prevailed. The former of these was going on when last year's report was sent in ; 183 cases and 23 deaths have been reported as occurring between the beginning of April and the 16th June 1873 : and not a single case occurred between the latter date and the end of December of the same year ; but then the disease broke out again and from that date up to 31st March 1874, 57 cases and 13 deaths are reported, making a total during the 12 months of 240 cases and 36 deaths. Of the cases occurring during the part of the epidemic mentioned in 1873, 12·6 per cent. died, while of those attacked during the first three months of this year 22·6 percent died : this seems to show that the protection of the people by vaccination has not increased progressively during the year, as apparently there is still a large proportion of the people liable to fatal attacks of small-pox ; but it is encouraging to observe that in the last epidemic there has not been a single case among the vaccinated which proved fatal.

Measures taken to prevent spread of small-pox.

7. During the last few weeks all that could be done to try and arrest the disease has, I think, been done. At first an attempt was made to isolate the cases in a separate building, but the patients could not be induced to leave their houses : as soon as a case occurs, the friends, as many as will submit to the operation, are vaccinated, whether previously protected or not : and intercourse between the sick and their neighbours is prevented as far as possible ; as soon as the patient is convalescent or dead, the house, if a cheap temporary one, is burnt down, if of a more expensive kind, it is disinfected with chlorine, the walls scrubbed and whitewashed and the earth of the floor taken up, buried and fresh earth put

down in its place: the clothes if of poor material are burnt, if of greater value they are disinfected with chlorine and then boiled: and at the same time vaccination is being carried on more vigorously than before as there are many people here still unprotected: and revaccination is also performed as much as possible. I fear that lately the dispensary medical officer has relapsed somewhat in his efforts to try and induce all the unprotected to be operated on, otherwise I cannot account for the great number of people who are still unprotected and who therefore are liable to bad unmodified small-pox. Vaccination is now however being carried on vigorously on three days of every week and before each of these days persons are sent round to look up all the unprotected, both children and adults, but it is very difficult to induce the latter to submit to the operation.

Revaccination.

8. I believe all that is possible is now being done to arrest the disease: the two most important things are isolation and vaccination; but the former I believe to be impossible, we must therefore rely upon the latter and endeavour to have it carried out more vigorously and carefully than ever.

KOLHA'PUR CIVIL HOSPITAL.

Honorary Surgeon G. Sinclair.

Population 38,979.

In forwarding the accompanying vaccination returns exhibiting the work done at the civil hospital and dispensary, Kolhápur infantry and jail during the past official year, I would beg leave to make the following observations on the work done by the hospital assistants attached to each of these charges, because I think that a separate notice of each will give much encouragement and promote greater zeal in the cause of vaccination.

2. 360 vaccine operations were performed by 3rd Class Hospital Assistant Vithal Dhanáji at the civil hospital and dispensary during the past year; 309 of these were successful, giving a percentage of 96·2, while the proportion of children under one year amounted to 35·8 per cent. of the whole number. Compared with the number vaccinated during the previous year there is a decrease of 147, which is attributable to two causes; firstly, the station vaccinator worked in the town of Kolhápur and so reduced the number of children who would otherwise have been brought to the dispensary; and secondly, but principally to the lull caused by the absence of small-pox throughout the past year. Great apathy and indifference is exhibited by natives generally in bringing their children for vaccination until their fears are fairly excited by the presence of epidemic small-pox among them.

3. Vaccination is regularly performed every Monday morning throughout the year and continues to be regarded as an important element in dispensary practice. The quality of the lymph has been good and the resulting vesicles and cicatrices were very satisfactory.

4. 57 children were vaccinated during the past year at the Kolhápur infantry hospital by 1st Class Hospital Assistant Cáshirám Chawán. They were all under one year. 54 of these were successful, giving a ratio of 94·7 per cent. Revaccination has been carefully and regularly carried out during the past four years. Every man, woman and child belonging to the Corps has been brought under the protective influence of this prophylactic.

5. On the principle that revaccination is not only a measure of renewed security against small-pox, but as a test of the completeness of the protection afforded by previous vaccination or inoculation, every prisoner admitted into jail

is revaccinated. This course has been pursued during the past four years, and the unusual number of positive results attending these operations is remarkable. During the past year 369 prisoners were revaccinated. The lymph was always obtained from healthy infants who had been vaccinated at the dispensary during the preceding week. Of 369 revaccinations, 33 presented marks of previous vaccination, 290 had marks of small-pox and 46 bore marks of inoculation.

The results in the 369 operations were as follow :—

	Successful.	Unsuccessful.	Unknown.	Total.	Percentag of successful operations.
Previous vaccination	23	10	...	33	69·6
Do. smallpox-	216	64	*10	290	77·1
Do. inoculation	32	14	...	46	69·5
Total...	271	88	10	369	75·4

Many of those returned as successful presented perfect vaccine vesicles. In a large proportion, however, the resulting vesicles were more or less modified, *i.e.*, although the vesicles were generally well developed and contained lymph, still there was little or no inflammatory action present. I regret that I did not record the successful operations under separate heads, viz., perfect vesicles and modified; this will be attended to for the future.

SA'WANTWADI DISPENSARY.

Assistant Surgeon Barjorji Ardaseer, G.G.M.C.

Population 8;017.

The number of persons vaccinated during the year was 518 in the town, local corps lines, and the jail. Of these 352 were primary vaccinations and 166 were revaccinations. Of the former 184 were males and 168 females; 46 were christians, 226 hindus, and 80 musalmans; 169 were under one year and 183 above one year of age. As regards the result, 336 were successful, 25 unsuccessful and doubtful, and 7 unknown. There were 16 operations in excess of persons. The percentage of success was 93·0.

2. Of the 166 revaccinations, 98 were successful, 63 unsuccessful, and 5 unknown. The percentage of success in revaccinations was 60·8.

3. 11 primary vaccinations and 1 revaccination were done in the local corps lines in the sepoys' families.

4. 124 revaccinations were performed in the jail during the year. 102 subjects had previous marks of vaccination and 22 were either inoculated or had the natural small-pox. The result was as follows :—Amongst those who were pre-

* These 10 prisoners were released before the results of the operation could be ascertained, but it is only fair to presume that more than half the number were successful.

viously vaccinated the revaccination was successful in 63, unsuccessful in 34 and the result in 5 was unknown. Of those who had the inoculation or small-pox before, 16 were successful and 6 unsuccessful.

5. The condition of the lymph during the year was mostly good. Whenever it failed it was renewed from the state vaccinator. Weekly vaccinations from arm-to-arm were performed almost througout the year in all the different parts of the town. Vaccination is firmly established in this state and though the people are not very forward to have it, yet they have no objections to its performance.

Small-pox.

6. 10 sporadic cases of small-pox occurred in the town during the year; one case was in May, 2 were in January, 3 in February and 4 in March. All the subjects had been vaccinated and they all recovered. In 5 the small-pox was distinct and in 5 it was confluent. There was some small-pox in the districts generally throughout the year. The state vaccinator has said about 131 cases, 74 in males and 57 in females; 51 were vaccinated and 80 were unprotected. 13 of the unprotected died.

ALIBAG DISPENSARY.

Assistant Surgeon M. F. Pereira, L.M.

Population 5,473.

Vaccination and revaccination.

During the year 1873-74 the total number of vaccinations (primary) and revaccinations was 209 or 2 more than in the preceding year. 200 were primary and 9 revaccinations.

Result and percentage

2. Primary vaccination was successful in 182 cases, giving a percentage of 91; revaccination succeeded in 8 out of 9 cases, giving a percentage of success of 88·8.

Caste, age and sex.

3. All the revaccinations were performed on christians. Primary vaccination was practised on 177 hindus, 9 musalmans and 14 jews. Of these 103 were males and 97 females; 94 were under and 106 above the age of one year.

Small-pox.

4. This eruptive fever prevailed to a slight extent in the months of April and May, and again in November and December. In the month of May the European gentry were revaccinated, and the result showed that they were not protected by the former vaccination performed in infancy. Although these examples were before the eyes of the natives, yet I could not prevail on even one of them to receive revaccination.

Lymph.

5. The quality of the lymph was very good, but whenever it deteriorated it was renewed. The failure in the 18 cases was attributable, probably, to the lymph having been forwarded to me in tubes. Arm-to-arm vaccination invariably gave successful results. As it is not possible to get children every eight days to keep up the supply, it renders the use of tubes a matter of necessity. However, direct vaccination was practised as much as possible. The supply of lymph was sometimes obtained from the táluká vaccinator, but that forwarded by the district vaccinator of Pen gave the most satisfactory results.

House to house vaccination.

6. This was the only way in which vaccination could be performed. Although the people believe in the benefits conferred by vaccination, yet they, through mere indifference or inability to perform certain religious ceremonies connected with the small-pox,

generally try to evade or postpone vaccinating their children. This circumstance renders it necessary to carry on vaccination from house to house. I received very little assistance from the mámledár.

7. Area. Dispensary vaccination extended over the town of Alibág, containing 5,473 inhabitants according to the last census, and the neighbouring villages of Chendrá, Warsoli and Chálmálá.

PEN DISPENSARY.

Mr. Harírâo Powár, 2nd Class Hospital Assistant.

Population 6,514.

The total number of vaccinations amounts to 121 or 60 more than in the previous year. All were primary vaccinations. 111 were hindús. 66 under one year and 55 above it. One was a grown up person. I had 9 operations in excess of persons. 107 were successful, 21 unsuccessful and the result of the remaining two was unknown. The percentage of successful vaccination was 83·5.

The people of this town are generally against vaccination. I took every opportunity of informing them of the very many benefits that arise from vaccination; but I am really very sorry to say that all my attempts to remove their prejudices have been fruitless. Though they admit this innovation to be good, yet they are deterred from adopting it, on the ground that they thereby incur the displeasure of the goddess Shitalá. Of late, through the assistance given by Ráo Sáheb Pándurâng Sadáshiva Sháháne, mámledár of this táluká, I am very happy to say that, I was able to vaccinate a good many children.

MA'THERAN.

Surgeon-Major David Simpson, M.D., Superintendent.

Population,.....(small and variable).

Vaccination has been performed as shown in the accompanying statement by 1st Class Hospital Assistant Mr. Gangáji Ramji; at the present time all the children are protected. Under 1 year 3 vaccinations are reported, over 1 year 7 children have been vaccinated; the age of the oldest was 5 years, the others were between 1 and 2 years of age. The parents of the children submit to have their children vaccinated but very few of them show any anxiety to have the operation performed, and in some instances their sanction could only be obtained by making known amongst them that unprotected children could not be permitted to remain on the hill. During the past year the existence of small-pox in Matheran or in its vicinity has not been known.

KURLA' DISPENSARY.

Assistant Surgeon Cuvarjí Dorábjí, G.G.M.C.

Population 3,000.

142 children were vaccinated, being 44 more than in the previous year. The operations were mostly performed by the assistant surgeon in charge and a few by the native medical pupil attached to the dispensary. The population in which these operations were performed was about 3,000. The people of this district, chiefly the christians, seem to appreciate the benefit of this prophylactic and willingly submit their childern to it, but are

very unwilling to allow the lymph to be taken from their children's arms, for the purpose of vaccinating other children. This acts as a great drawback, the lymph supply gets interrupted and often a week or two pass without any operations being performed.

2. The percentage of successful cases was 90·7.

3. The lymph employed was generally good, but great difficulty was experienced in keeping up its supply. Lymph was introduced several times from Bombay, by sending a man by train so that it might be used the same day.

4. No cases of small-pox were admitted during the year.

KALIA'N DISPENSARY.

Assistant Surgeon A Bomanjí, G.G.M.C.

Population 12,804.

161 operations were performed during the year. This number, when compared with the population of the town, which according to the last census is 12,804, is I must confess small. There is no want of zeal on my part nor of aid from the mámledár and other officials, but the people are much behind in recognizing the value of vaccination. For the most part they offer resistance to vaccination and still greater resistance against allowing lymph to be taken from their children's arm, so much so that for the latter three and a half months of the year—the time during which I held charge of this dispensary—the lymph was brought from a distance four or five times. Once a week I go into the town and collect children for operations near the mámledár's kacheri or other convenient part as near the houses of the inhabitants of Kalian as possible.

2. Of the total number vaccinated there were 139 hindús, 15 muslamáns, 6 párs̀is, and 1 of low caste. There were 68 males and 93 females.

3. The number vaccinated this year shows a fall when compared with the previous year, and I am unable to account for this, inasmuch as I have been in charge of this dispensary during the latter three and a half months only of the year. In future I shall try my best to vaccinate a greater number of subjects.

KHA'NDESH BHIL CORPS HOSPITAL.

Mr. J. A. Lafond, Apothecary.

Population 10,385.

Vaccination in the Bhil Corps Police was carried out by myself and my assistant with the following results :—

Primary Vaccination.—Under this heading 61 children were vaccinated, of these 27 were under 1 year old and 34 above that age. 51 of the operations were successful, 10 failed, and the result of one child, who was twice vaccinated, could not be ascertained as the mother left the lines, taking the child with her, after the second operation. The 10 cases that failed occurred chiefly amongst weakly children and children of Bhils, who, as a rule, are very neglectful of their offspring in many ways.

Revaccination.—As a large body of recruits for the Khándesh Bhil Corps and unarmed police were entertained during the year, I commenced to revaccinate them in June and completed the undertaking in September with the following re-

sults. 178 men were operated upon, and 40 men were operated upon twice; 170 operations succeeded and 48 failed, giving a percentage of 77·9 successful cases.

Small-pox.—One slight case of small-pox occurred in a recruit boy of the Bhil Corps during the month of July. He was isolated in a separate room by himself, and under ordinary treatment recovered and returned to duty. As far as I know, no cases of small-pox occurred in the town of Dharangáon or in the villages in its immediate vicinity. Dharangáon (both town and lines) enjoys a peculiar immunity from epidemics.

BALSA'D DISPENSARY.

Assistant Surgeon Nasarwánjí Dhanjibhái, G.G.M.C.

Population 11,315.

214 vaccinations were performed. As compared with the preceding year there is an increase of 29 vaccinations. This is the largest number ever vaccinated at this dispensary. The castes were 1 christian, 159 hindús, 33 musalmáns and 21 pársís; of these 97 were males and 117 females; 106 were children under one year and 108 above one year of age. There were 183 successful operations, 19 unsuccessful and doubtful and 12 unknown. The percentage of successful cases was 90·5.

2. There was no admission from small-pox into the dispensary. The population of the town is 11,315. In order to carry on vaccination more efficiently and to keep up the supply of lymph throughout the year in this large town, where the people are more opposed to vaccination and conceal their vaccinated children or scratch their children's vesicles to prevent the lymph being taken away, the assistance of a peon attached to the dispensary is absolutely necessary, as there is no peon attached to the dispensasy at present, and as the assistance of the havaldár of the town, and a peon from the municipality given for a couple of hours on vaccination days, is irregular and insufficient.

JAMBUSAR DISPENSARY.

Mr. Parashrám Nágesh, 3rd Class Hospital Assistant.

Population 14,924.

358 children were primarily vaccinated, out of whom 189 were males and 169 females. 333 were hindús, 24 musalmans and, 1 pársí. 224 were under one year and 134 above it. 337 were successful and 21 unknown. There were 2 revaccinations.

2. Vaccination was generally performed weekly in the streets of the town, where there was no objection to come made by any caste of the people.

3. I found many difficulties in getting children of high caste people, and found them generally unwilling to have the operation.

4. Assistance given by the mámledár here was of no use, because I was myself obliged to go to get children from house to house.

5. The number of children vaccinated during the year amounted to 360, which is less than the year 1872-73 by 111. The lymph was of a good quality.

6. There was no epidemic small-pox during the year 1873-74.

GODHRA' DISPENSARY.

Assistant Surgeon Shántarám Vináyak Kantak, L.M.

Population 10,641.

During the past year 466 individuals were vaccinated primarily against 356 in the previous year. Vaccination was performed throughout the past year in the town. During the greater part of the year the lymph was good, but it deteriorated about the months of October and November. As vaccination in a kasbá town, throughout the year, is very difficult to accomplish from the paucity of numbers, I submit that it might cease four months in the year during the monsoon. The people are averse to getting their children vaccinated during the hot season. It will be seen from the return that the musalman element predominates. The police authorities lend me the assistance of a police peon to enable the police patil to collect children. There is no doubt that the people have felt the benefits of vaccination; but they resolutely refuse to allow lymph to be taken out of their children's vesicles. They seem to think that a child gets weakened and anæmic by such abstraction of lymph.

2. There has been no epidemic of small-pox in the town of Godhrá during the past year.

GOGO DISPENSARY.

Mr. Lewis George, Apothecary.

Population 9,571.

The total number of persons vaccinated during the year has been 254. 141 males and 113 females; among them were two male adults, who being sea-faring men had to obtain a certificate of having been vaccinated. One of these had faint marks of having been vaccinated, and the other had visible marks of having had small-pox; the latter on being revaccinated, took the disease, but the youth who had faint marks of having been previously vaccinated did not. There has been an excess of 58 operations over the preceding year, when only 198 were vaccinated. The vaccination up to the 10th October 1873 was steady in progress, and although the lymph on that date appeared good, yet the vesicles were small on the 8th day, and the only way I could account for this deterioration is by the thermometric maximum sun's rays having considerably increased on the 6th idem to 135° and on the 17th idem I saw that the vaccination had completely failed. It was found afterwards difficult to obtain good lymph in tubes, as only 3 children were vaccinated in November and 2 children in December from lymph received in capillary tubes from the assistant superintendent of vaccination who was then at Talajá, and these failed, which rendered vaccination in abeyance till the 23rd January 1874 when the superintendent of vaccination sent some lymph in tubes, and this was successful, and from this period I vaccinated 93 children, giving a result of 11 unsuccessful vaccinations from 93. Although the vaccinations have not proved uniformly successful, yet I have been fortunately keeping up the vaccination till the arrival of the present superintendent, who has now introduced English lymph, and I hope to continue up the success.

KARACHI CIVIL HOSPITAL.

Surgeon Major N. Hopkins, Civil Surgeon.

Population 51,822.

Vaccination has been carried on during this year as previously, by one of the vaccinators provided by the municipality.

2. The vaccinator sends his returns to the superintendent of vaccination in Sindh through me. He brings me some children every week so as to enable me to report every month on the character of the vesicles and lymph.

3. There were only 2,828 persons vaccinated and revaccinated during the year, which the vaccinator explains by the increased difficulty in getting children to be vaccinated as there has been no small-pox about to frighten the parents; among primary vaccinations there were 1,754 successful, 100 unsuccessful and 46 unknown; of the number of revaccinations 989, there were 591 successful, 375 unsuccessful, and 23 unknown, giving a percentage of 94·6 in primary and 61·1 in revaccination.

4. The pay of the vaccinator is Rs. 15 a month, or Rs. 180 a year, the contingent bills amounted to Rs. 53-8-0, so that the cost of the whole working establishment was only Rs. 233-8-0, which divided by the operations gives one anna and three pies as the cost of each operation and one anna and seven pies as the cost of each successful operation.

5. There is a great increase in the number of revaccinations over former years; this is in a great measure due to revaccination being carried out thoroughly in the jail. All convicts who have not distinct cicatrices of either vaccination or small-pox are vaccinated. Persons vaccinated at the jail and hospitals were not included in this return, but were shown separately till this year. The vaccinator reports that he has great difficulty in getting some parents to permit their children to be vaccinated, and afterwards there is great difficulty in finding them to ascertain the result, and it is only when small-pox comes to the immediate neighbourhood that they seek vaccination.

KETI BANDAR DISPENSARY.

Mr. F. Jacob, 3rd Class Hospital Assistant.

Population 2,199.

The total children vaccinated during the year is 228, being 167 in excess of the previous year.

2. The quality of the lymph was very good.

3. On my arrival in April last, I heard that small-pox was prevailing in the town and adjacent villages. I immediately applied for and obtained fresh lymph from the táluká vaccinator and vaccination was practised until 15th July last. The assistant superintendent of vaccination, Karáchi collectorate, on visiting this dispensary in February last, informed me that one case of small-pox had been seen by him in the out-skirts, in close proximity to this station: I therefore applied to the vaccinator for fresh lymph and commenced vaccinating the children newly-born and also those that were left unvaccinated from July owing to their illness. 19 cases of small-pox have been reported at the kotwál's office during the year, of these 3 were males, 10 females, and 6 children, out of these 3 cases proved fatal. None of these applied

for treatment at the dispensary. During the prevalence of this epidemic great sanitary precautions have been taken since my arrival. The disease disappeared from this town immediately on finishing the vaccination in July last.

TA'TTA DISPENSARY.

Mr. Sylvester, Apothecary.

Population 7,951.

The number vaccinated this year is 342, and the number of operations were 364 or 23 in excess of persons. In comparing the number vaccinated with the preceding year there appears an increase of 233 in favour of this year. This increment is due to the following circumstance. At the end of March it was reported that there were 105 children still unprotected in the town, although previous to this vaccination was carried on continuously from week to week, and the peons could not succeed in bringing more than 3 or 4 at a time. However during the month of April last, with the assistance of the head munshi and some of the municipal commissioners, I managed to obtain 76 children for vaccination. Again during the month of May Dr. Williams visited this town, and through his influence nearly 700 children were collected for inspection. Out of this number 163 were found unprotected and lymph being at hand, 104 of them were vaccinated by me on the spot and others gradually afterwards, so that in the month of May there were in all 190 children operated upon. Since then vaccination continued until the end of December, when no more children could be had.

2. Out of the number vaccinated there were 233 males and 108 females and these when classified according to caste were 198 hindús and 143 musalmans : 60 of them were under one year and 281 above it. The result of those primarily vaccinated was 272 successful, 72 unsuccessful and doubtful, and 20 unknown ; the percentage of successful cases being 79·0. Several of the unsuccessful cases were operated on two or three times without beneficial results. One young man with faint marks of previous vaccination was revaccinated unsuccessfully.

3. The condition of the lymph was generally good. The vesicles were round and pearly with a central depression, the skin surrounding it being tense, painful, and rosy red in fair children. The cicatrices were circular foveated, depressed, and of a darkish colour.

4. I am glad to record that there has been no case of small-pox this year. I am not aware of inoculation being practised here. The chief obstacle to the spread of vaccination is the prejudices amongst hindús ; as they believe that their deity is displeased if the children are vaccinated, and many of them in consequence prefer to be attacked by small-pox. This idea could only be removed gradually as education advances, and the benefits of vaccination are more appreciated.

5. This is a large town and although a great many have been vaccinated this year, I am assured there are still more unprotected ; and these can only be detected by frequently going about the streets. Very few voluntarily present their children for vaccination, and those vaccinated are often hidden to prevent the lymph being removed. Often, children vaccinated during a week cannot be found next week, and if these are present fresh subjects are not forthcoming. Also the mukhtiarkar's peons being frequently changed, the children are brought irregularly, and thus the lymph becomes degenerated and unfit for use. To obviate all these drawbacks and to ensure the dissemination of vaccination effectively I would suggest that a special peon should be allowed me, whose duty should be solely to look out for children during the week and have them ready on the vaccination day.

6. With the exception of sometimes an erythematous or eczematous eruption occurring after vaccination on the arms of children, I have not observed any irregularity in its progress or any ill effects resulting from it.

7. In this town only one case of small-pox after successful vaccination was brought to my notice, and it was a very modified type of the disease.

8. During the last year when small-pox broke out in this town, only those who were not vaccinated were attacked, while the vaccinated children escaped the disease.

MEHAR DISPENSARY.

Mr. Hanmantráo Bhosle, 3rd Class Hospital Assistant.

Population 1,246.

325 vaccine operations have been performed during the year under report, of which 223 were primarily vaccinated and 102 revaccinated. The former consisted of 193 males and 28 females; 85 hindús and 136 mohamedans; 45 were under one year and 176 above it; the result was 207 successful, 2 unsuccessful and doubtful, and 14 unknown, and the percentage of success is 99·0. The result of the latter was 92 successful and 10 unknown, and the percentage of success 100.

2. There is a considerable increase of 291 in the number of persons vaccinated and revaccinated compared with the previous year; this is chiefly owing to the adoption of special measures for securing the attendance of persons at the dispensary by me as well as to my taking the trouble to visit them at their own houses for the purpose of vaccinating.

3. The lymph during the year was fresh and good; the vesicles appeared full and were of large pearly appearance, and the cicatrices were good in most of the cases.

4. No small-pox came under my notice nor the custom of inoculation.

5. No ill effect resulted from vaccination.

ROHRI DISPENSARY.

Mr. Shaik Walí, 1st Class Hospital Assistant.

Population 8,781.

The number of children vaccinated was 303 and as compared with the previous year there is a decrease of 234. This is chiefly owing to an order having been received on the 21st December last from the Superintendent of Vaccination in Sindh, to the effect that I should discontinue the performance of the operation till further orders, as also to strong objection and opposition on the part of the inhabitants of the town.

2. There were 174 male and 129 female children vaccinated; 193 were under and 110 above the age of one year. The number shown above comprises 133 hindús, 166 mahomedans and 4 other castes. The result in those primarily vaccinated was 296 successful and 7 unknown.

3. The lymph was very good; the vesicles appeared full and the cicatrices good.

4. No small-pox prevailed during the year, nor inoculation or other obstruction to the spread of vaccination existed with the exception of the one mentioned in the first para. of this report.

5. No irregularities in the progress of the vaccine disease have occurred, nor have any ill effects resulted from vaccination.

6. No instance of small-pox occurred after unmistakeably successful vaccination or after well marked previous small-pox.

ADEN.

Surgeon G. W. R. Hay, M.D., Acting Civil Surgeon.

Population, 19,289.

There has been an increase in the number of persons vaccinated during the past year of no less than 581 as compared with 1872-73. The number of cases in which the operation was successful is also greater by 386. The percentage of success is also higher, but is still, I think, much lower than it might be. The unsuccessful operations are, I am led to believe, principally among the Somalis, while among the Jews nearly every one succeeds; this I think shows that it is not altogether the manner in which the operation is performed which influences the result. Many of the cases brought for inspection have the vesicles quite destroyed by the persons having scratched them about the fifth or sixth day. I have not been able to find out what sort of cicatrices result. The vesicles are also stated to have been good. Those I have seen during the last two months when not scratched have been typical. Lymph has been supplied during the year to the different regiments and I believe has given satisfaction.

2. At present vaccination is practised thrice a week, once in camp and the other two days at the Malla and Steamer Point.

Report on Re-vaccination by the Deputy Surgeon General, Puna Division of the Army.

In conformity to the instructions contained in your letter No. 3198, dated the 12th September 1872, monthly returns of revaccination from 6 jails and 4 native regiments have been received, and the results are shown in a tabulated statement appended to this report.

The experiments undertaken embrace a period of three months, and the total number of persons operated on is 249. Of these 76 were adults, bearing distinct traces of previous vaccination and 173 who showed equally traces of small-pox.

Of the 76 persons operated on who had been previously vaccinated 17 or 22 per cent. proved successful. 52 or 67 per cent. were unsuccessful and in 7 the results are unknown.

The results obtained from persons who had had small-pox were still more unsuccessful. Of the 173 vaccinated, only 41 or 23 per cent. were successful cases and 130 or 75 per cent. unsuccessful, leaving 2 in whom the results could not be ascertained as they left the jail very shortly after vaccination.

The summary then of these experiments is as follows :—Of the 249 operations performed (omitting the cases unknown) vaccination proved successful in only 58 persons, and unsuccessful in 182, giving a percentage of 23·1 in the former to 75·8 in the latter. The result now obtained will be found, I think, more in accordance with ordinary belief and with the experience of all who have largely practised vaccination in this country.

Re-vaccination.

Record of the results of experiments made agreeably to directions conveyed in letter No. 3198, dated 12th September 1872, from the Secretary to the Surgeon General, Indian Medical Department :—

Number of persons.	Number or name of regiment or jail.	Of persons previously vaccinated with success.				Of persons who have had small-pox.				Remarks
		Number of persons operated on bearing traces of previous vaccination.	Result.			Number of persons operated on bearing traces of small-pox.	Result.			
			Successful.	Unsuccessful.	Unknown.		Successful.	Unsuccessful.	Unknown.	
37	Kolhàpur Jail	12	5	...	7	25	17	8	...	
44	Punà City do.	8	1	7	...	36	6	30	...	
46	Yerowda do.	9	...	9	...	37	...	37	...	
28	Ahmednagur do.	2	...	2	...	26	3	23	...	
2	Sholàpur do.	1	...	1	...	1	...	1	..	
14	Nàsik Civil do.	2	...	2	...	12	6	4	2	
11	Regt. 1st Gr., N. I.	8	...	8	...	3	...	3	...	
19	,, 2nd ,, N. I.	14	5	9	...	5	2	3	...	
34	,, 13th N. I.	16	5	11	...	18	6	12	...	
14	Sappers and Miners	4	1	3	...	10	1	9	...	
249		76	17	52	7	173	41	130	2	

31*st March* 1873.

G. G. MAITLAND,
Deputy Surgeon General.

Extract from the Report on Revaccination by the Deputy Surgeon General, Presidency Division of the Army.

In the regimental hospitals 186 were revaccinated, the persons bearing marks of previous genuine vaccination; out of these 41 cases were pronounced successful, that is the resulting vesicles were, 20 good, and 21 middling; the remainder were followed by a few with badly formed vesicles and the larger number were unsuccessful. The percentage of success here is 22·04, excluding vesicles pronounced bad. 61 cases showing marks of small-pox were vaccinated; in these, 26 cases were successfully operated on, that is 16 cases had good vesicles and 10 middling vesicles, the rest of the operations were followed by 10 bad vesicles and 25 with no success. The percentage of success here is so large as 42·62. Of 11 cases vaccinated, which bore the distinctive inoculation mark on the front of the fore-arm, 2 were operated on with good vesicles resulting, 7 with middling results, and 2 were unsuccessful. The percentage here is 18·18.

In jails:—The results, generally, show that in a total of 448 cases of previously vaccinated prisoners, there were 119 successfully revaccinated; 67 of these had good vesicles, and 52 middling; of the remainder, 51 had vesicles but they were bad, 6 cases were unknown, and the remainder, 279, were unsucessful; the percentage here then was 26·56.

Out of 554 cases which presented marks of previous small-pox, 147 were successfully vaccinated, 69 with good vesicles, 78 with middling, giving a percentage of 26·48; 141 had bad vesicles and 266 were unsuccessful.

There were 26 prisoners who had the distinctive marks of inoculation, 13 of these were successfully vaccinated, 2 only with good vesicles, 11 with middling, 50 per cent.

The results of revaccination, in these two tables, very closely agree, 22 per cent. in regiments and 26 in jails being successfully operated on. The results of vaccination on persons who previously had small-pox differ, in regiments being 42·61 per cent. and in jails 26·48. The results on persons who had been inoculated differ also, in regiments being only 18·18, while in jails it was so high as 50 per cent. That revaccination is necessary has long been well-known, and the percentages here shown, prove, as far as they go, that more attention than is yet given to this subject, would not be thrown away. One of the cases of revaccination in the return submitted, in Her Majesty's 21st Regiment N. I., had been three times vaccinated and revaccinated, successfully, yet such was the peculiarity of constitution, that the child had small-pox soon after the last vaccination, though in a mild form. In establishments, jails, regiments and all collections of people, for any length of time, the work of revaccination might be carried on systematically; and amongst the people as much as the vaccination department could effect.

On the results of vaccination of persons having marks of small-pox I cannot place confidence. There is no doubt, that the law of small-pox being a disease appearing only once in life, is far more frequently broken than was before known, and that very many exceptions occur to it; but that so large a percentage of cases as 42, would be obnoxions to the disease again, cannot be considered correct; it is not unlikely that a variety of marks may be, and are mistaken for small-pox, and that enquiries concerning them amongst natives; especially of the classes found in regiments and jails, would, as a rule, elicit information not quite reliable; the results however go to show that many adults have never been vaccinated, and that often they have, probably, not been vaccinated in consequence of the existence of these marks. In the inoculated, the marks cannot be trusted, unless accompanied with marks of small-pox, and the percentage on these, as shown in jails, may not be far from correct. Inoculation is however falling much into desuetude, though doubtless still practised in out of the way places, as it continues to hold a strong place in the minds of many natives.

The percentages shown by the medical officer, Sappers and Miners, Madras, are 77·77, 78·57 and 65·67 respectively; these results are, I am glad to say, not approached by the revaccinations performed in this division, which however appear to me, as regards vaccination, to point out the necessity of a most watchful care being taken in securing perfect lymph, from carefully selected vesicles; for it had been observed by an authority that the protective power of vaccination has been "impaired to an incalculable extent by imperfect vaccination"; and Jenner himself said that "there may exist every gradation in the state of a pustule, from that slight deviation from perfection which is quite immaterial, up to that point which secures no protection at all."

T. B. JOHNSTONE, M.D.,

4th September 1873. Deputy Surgeon General.

Number or name of Regiment or Jail.	Result of the re-vaccination of persons previously successfully vaccinated.					Result of the revaccination of persons who have had small-pox.					Result of the revaccination of persons who had previously been inoculated.					Grand Total.	Remarks.
	Successful.			Unsuccessful.	Total of operations.	Successful.			Unsuccessful.	Total of operations.	Successful.			Unsuccessful.	Total of operations.		
	Character and number of the resulting vesicles.					Character and number of the resulting vesicles.					Character and number of the resulting vesicles.						
	Good.	Middling.	Bad.			Good.	Middling.	Bad.			Good.	Middling.	Bad.				
H. M.'s 21st Regiment N. I	2	7	2	58	69	...	...	...	5	5	...	...	...	...	...	74	
H. M.'s 19th Regiment N. I	6	4	1	2	13	9	1	2	4	16	...	...	...	...	...	29	
Detachment H. M.'s 11th Regiment N. I.	9	6	6	54	75	7	5	4	9	25	1	...	1	...	2	102	
H. M.'s 26th Regiment N. I	3	4	11	11	29	...	4	4	7	15	1	...	6	2	9	53	
Total.....	20	21	20	125	186	16	10	10	25	61	2	...	7	2	11	258	
Surat Jail	2	17	41	22	82	11	57	129	54	251	...	...	...	...	...	333	
Ratnagiri Jail	...	1	...	5	6	...	...	...	6	6	...	1	...	1	2	14	
Aden Jail	12	2	2	6	22	32	5	6	19	62	...	...	...	...	...	84	
Sawantwadi Jail	23	22	8	41	94	2	1	2	5	10	2	10	3	9	24	128	
H. M.'s Common Jail, Bombay	4	10	...	101	115	3	14	4	111	132	...	...	...	...	...	247	
H. M.'s House of Correction, do.	23	...	...	103	132*	18	1	...	71	91*	...	...	...	...	...	223*	* Result unknown of seven cases as the prisoners were discharged.
Karwar Jail	3	...	...	1	4	3	...	...	...	3	...	...	...	...	...	7	
Total.....	67	52	51	279	455*	69	78	141	266	555*	2	11	3	10	26	1036*	
Grand Total.....	87	73	71	404	641*	85	88	151	291	616*	4	11	10	12	37	1294*	

REVACCINATIONS.

Ra'jkot Jail.

In accordance with the instructions contained in the letter of the Inspector General, Indian Medical Department, No. 3215 of 1872, dated 13th of September last; and also the recommendation contained in the letter No. 669 of 1872-73 of the Superintendent General of Vaccination, Bombay Presidency, dated 26th September 1872, I have the honour to forward herewith a detailed statement of revaccinations carried on among the prisoners at the Rajkot jail, the results of which I am satisfied by personal observation have been most carefully and diligently noted by 3rd Class Hospital Assistant Rámráo Jánú attached to the jail hospital.

The total number of prisoners vaccinated was 70, of whom 46 were protected by small-pox; 8 were protected by previous vaccination and 16 by revaccination. It will thus be observed that not a single unprotected case was to be found among all the prisoners in the jail, a circumstance that speaks well for the careful and efficient manner in which vaccination has been performed in the province for some time; although the fact that there were 46 prisoners who had small-pox previously, the great majority in their childhood, would tend to prove that inoculation is still widely practised among the peasantry of Káthewád.

Of the 46 cases protected by small-pox, vaccination was successful in 26 cases or in the proportion of 56·52 per cent.; unsuccessful in 13 cases or 28·26 per cent., and doubtful in 7 cases or 15·21 per cent.; or in other words it was found that the number of successful cases was about double the number of the unsuccessful; and nearly four times that of the doubtful cases.

There were no doubtful cases in those previously vaccinated.

Finally, as regards those cases, 16 in number, protected by revaccination only 2 or 12·5 per cent. were successful; whereas 14 or 87·5 per cent. were unsuccessful; or in other words the successful cases were to the unsuccesful nearly in the proportion of 1 to 7.

Revising the results of the foregoing experiments, if it be permitted to draw inferences from the figures above stated and if we are to regard susceptibility to vaccination as a measure of liability to the attacks of small-pox, it will be conceded that neither infant vaccination nor a previous attack of small-pox affords a very efficient protection against a subsequent attack; and that the best hope of security would seem to lie in revaccination. I would, however, respectfully submit that the number of cases experimented on is hardly sufficient to warrant us in making deductions in any other than a tentative manner; and that our duty lies rather in carefully noting and stating facts than in dogmatizing on what at best in the present state of our knowledge can be but a theory.

I am at present conducting a further series of investigations into this most important and highly interesting subject, the results of which shall be duly laid before you and may it is to be hoped shed some further light upon what now seems obscure, and so enable us to correct inferences we may be disposed to draw too hastily from the facts and figures now presented to your notice.

(Signed) E. SEXTON, M.D., Surgeon Major.

6th March 1873.

KA'RWAR JAIL.

An account of the vaccination of 136 inmates of Kárwár jail during the month of April 1874, tabulated according to the previous protection or otherwise of those operated on : the lymph was obtained from healthy infants and arm-to-arm vaccination was performed in each case.

As regards the meanings of the terms applied to the results of the vaccination : by " Good " is meant a large perfectly formed vesicle ; by " fair " is meant a large perfectly formed vesicle but smaller than the preceding ; both of these would be included under the head of successful vaccination : by " Doubtful " is meant those cases in which perhaps a small amount of lymph is formed but the vesicles have no definite shape and are very minute although there is a certain amount of inflammation round them ; by the term " Unsuccessful " is meant, that there is nothing to be seen but the small puncture made by the lancet : the two latter classes have been taken both together as "unsuccessful".

Cases previously protected by both Small-pox and Vaccination

Abbreviations : " D " means doubtful and " U " means unsuccessful.

Number of persons.	Character of small-pox marks.	Character and number of vaccination cicatrics.	Result of vaccination Number and quality of vesicles.			Secondary vaccination.
			Successful.		Doubtful and unsuccessful.	
			Good.	Fair.		
1	Few on body	4 good	6	.....	.....	.....
2	Do.	2 Do.	.....	6	.....	.....
3	Slight on face	2 bad	.....	6	.....	.....
4	Few on face and body... ...	2 small	.....	....	1 D	U
5	Few on face	5 large	.....	.....	2 D	2 D
6	Well on face	4 good	.....	.....	U	U
7	Few on body	2 Do.	.....	.....	6 D	U
8	Do.	4 Do.	.....	.....	1 D	U
9	Do.	2 Do.	.....	.....	U	U
10	Few on face	4 bad	.....	.....	3 D	U
11	Few on body	3 good	.....	.....	1 D	U
12	Well on face	2 bad	.....	.....	U	U
13	None visible	4 good	.....	.....	U	U
14	Few on face	None visible.	.....	.....	U	U
					D | U	D | U
14			1	2	6 | 5	1 | 9
				3	11	10

NOTES.—The secondary vaccination in the case of No. 11 is " unknown" because he left the jail before the time of maturation. In cases No. 13 and 14 we only have the word of the patients that they have had small-pox and been vaccinated respectively; there are no marks to prove it.

REMARKS.—Total number of cases 14, of these 3 were successful or about 21·5 per cent of these successful cases one was "good" and the other two "fair;" there were 11 unsuccessful, of these 5 were doubtful and 6 totally unsuccessful: of secondary operations 10 in number in one only was there any sign of the operation, in 9 there were no marks at all.

Cases previously protected by Small-pox.

Number of persons.	Character of small-pox marks.	Result of vaccination. Number and character of vesicles.			Secondary vaccination.
		Successful.		Doubtful and unsuccessful.	
		Good.	Fair.		
1	Few on face	6	...	...	...
2	No marks	5	...	...	...
3	Many on face	5	...	...	...
4	Few on face	5	...	...	...
5	Many on face	7	...	...	...
6	Few on body	6	...	...	...
7	Do.	5	...	...	...
8	Do.	6	...	...	...
9	No marks	6	...	...	...
10	Few on body	5	...	...	...
11	Few on face...	6	...	...	...
12	Few on face	...	1	...	...
13	Few on body	...	6	...	...
14	No marks?	...	5	...	...
15	Do. ?	...	5	...	...
16	Do. ?	...	5	...	...
17	Many on face	...	2	...	...
18	Do.	...	4	...	...
19	Few on body	...	6	...	...
20	Few on face	...	6	...	...
21	Do.	...	4	...	...
22	Do.	...	...	U	U
23	Do.	...	...	U	U
24	Many on face	...	...	4 D	U
25	Few on body	...	...	1 D	1 D
26	Many on face.	...	...	1 D	U
27	Do.	...	...	2 D	1 D
28	Few on face	...	...	3 D	2 D
29	Few on body?	...	...	U	U
30	Do. ?	...	...	2 D	U
31	Many on face	...	...	1 D	U
32	Few on body?	...	...	U	U
33	Few on face	...	...	1 D	U
34	Many on face	...	...	3 D	U
35	Few on body?	...	...	U	U
36	Do. ?	...	...	U	U
37	Do. ?	...	...	U	U
38	Many on face	...	...	4 D	2 D
39	Do.	...	...	6 D	2 D
40	Few on body	...	...	4 D	U
41	Few on face?	...	...	U	U
42	Few on body?	...	...	U	U
43	Do. ?	...	...	U	U
44	Many on face	...	...	4 D	U
45	Few on body	...	...	U	U
46	Do.	...	...	U	U
47	Few on body	...	...	U	U
48	Do.	...	...	U	U
49	Do.	...	...	2 D	1 D
50	Well on face	...	...	1 D	U

Number of persons.	Character of small-pox marks.	Result of vaccination. Number and character of vesicles.				Secondary vaccination.	
		Successful.		Doubtful and unsuccessful.			
		Good.	Fair.				
51	Few on body?	...	...	3	D		U
52	Do.?	...	...	1	D		U
53	Few on face	...	...	1	D		U
54	Few on body	...	...	1	D		U
55	Few on face	...	...	U			U
56	Many on body	...	...	U			U
57	No marks	...	...	2	D		U
58	Many on body	...	...	U			U
59	Few on face	...	...	5	D		U
60	Do.	...	...	U			U
61	No marks	...	...	5	D		U
62	Few on body	...	...	U			U
Total...				D	U	D	U
62		11	10	22	19	6	35
		21		41			41

NOTE:—In those cases which are marked ? the prisoners say that they have had small-pox, but the marks that they show are not distinctive. Total number of cases 62: of these 21 were successful or 34 per cent. of these 11 were "good" and 10 "fair": 41 cases were unsuccessful 22 of these being "doubtful" and in 19 there was nothing more to be seen than the mark of the lancet: of the secondary vaccinations 41 in mumber 6 were "doubtful" and 35 unsuccessful.

Cases previously protected by Vaccination.

Number of persons.	Number and character of cicatrices of former vaccination.	Result of vaccination. Number and character of vesicles.			Secondary vaccination.
		Successful.		Doubtful and unsuccessful.	
		Good.	Fair.		
1	1 Small	5	...	...	...
2	3 Good	6	...	...	...
3	6 Do.	5	...	...	...
4	4 Do.	6	..	...	...
5	4 Do	6	...	...	...
6	4 Do.	2	...	...	...
7	2 Do.	2	...	...	...
8	2 Do.	4	...	...	...
9	3 Small	3	...	...	...
10	3 Good	5	...	...	...
11	2 Small	4	...	...	...
12	4 Good	5	...	...	...
13	3 Do.	6	...	...	...
14	2 Do.	6	...	...	...
15	4 Do.	6	...	...	...
16	No marks	6	...	...	...
17	3 Good	...	6	...	...
18	No marks	...	4	...	...
19	2 Good	...	2	...	...
20	3 Do.	...	4	...	...
21	3 Do.	...	2	...	...
22	3 Do.	...	6	...	...
23	3 Do.	...	5	...	...

Number of persons.	Number and character of cicatrices of former vaccination.	Result of vaccination. Number and character of vesicles.			Secondary vaccination.
		Successful.		Doubtful and unsuccessful.	
		Good.	Fair.		
24	4 Good.	...	1	...	...
25	No marks	...	6	...	...
26	1 Small ... ... — ...	...	...	U	Not known
27	4 Good...	...	...	U	U
28	2 Do.	...	...	1 D	1 D
29	6 Do.	...	...	U	U
30	4 Small	...	...	2 D	U
31	6 Good	...	...	U	U
32	4 Do.	...	...	U	U
33	2 Do.	...	...	1 D	4 D
34	4 Do.	...	...	1 D	U
35	2 Do.	...	...	3 D	U
36	5 Do.	...	...	3 D	U
37	4 Do.	...	...	U	Not known
38	2 Do.	...	...	U	U
39	6 Do.	...	...	U	U
40	6 Do.	...	...	5 D	U
41	6 Do.	...	...	U	U
42	3 Do.	...	...	4 D	U
43	No marks (a very old man) ...	..	...	U	U
44	2 Small	...	...	1 D	U
Total		16	9	D | U 9 | 10	D | U 2 | 15
44		25		19	17

NOTE :—Those put down as having no marks all say that they have been vaccinated. Total number 44 of these 25 were successful or 56·8 percent : 16 being "good" and 9 "fair." There were 19 unsuccesful cases 9 of these were "doubtful" and 10 quite unsuccessful : of the secondary vaccinations 2 were "doubtful" and 15 perfectly unsuccessful.

Cases previously protected by Inoculation.

No.	Marks, number, size and position.	Result of vaccination. Number and character of vesicles.			Secondary vaccination.
		Successful.		Doubtful and unsuccessful.	
		Good.	Fair.		
1	1 Mark ¼ inch in diameter on each arm.	6	.....	.....	.....
2	1 Mark ⅛ do. do. ...	6	.....	.....	.....
3	1 Mark on left arm about ¼ inch in diameter.	5	.....	.....	.....
4	1 Mark on left fore arm about ⅓ inch in diameter.	3	.....	.....	.....
5	1 Mark ¼ inch in diameter on each arm.	.....	.....	6 D	U
6	1 Mark ¼ do. do. ...	.....	.....	6 D	U
Total. 6		4	.....	2 D 2	2 U 2

Four successful or 66·6 per cent.

Cases previously unprotected.

Number.	Result of vaccination. Number and character of vesicles.			Secondary vaccination.
	Successful.		Doubtful and unsuccessful.	
	Good.	Fair.		
1	2	.....	.....	.....
2	6	.....	.....	.....
3	6	.....	.....	.....
4	2	.....	.....	.....
5	6	.....	.....	.....
6	6	.....	.....	.....
7	6	.....	.....	.....
8	.....	6	.....	.....
.....	.....	5	.....	.....
10	.....	.....	1 D	U
Total..... 10 ...	7	2	1	1

Total No. 10 of these 9 were successful or 90 per cent.

Percentage of Successful Cases.

Small-pox and vaccination	21·5
Small-pox alone	34·0
Vaccination alone	56·8
Inoculation	66·6
Unprotected	90·0

S. J. GOLDSMITH,
Acting Civil Surgeon, Kárwár.

TABLES

OF

VACCINATION RETURNS, &c.,

FOR

1873-74.

ABSTRACT of the Vaccination Statements of

1	2		3		4	5	6		
Establishment.	Number of vaccinators.		Total number of persons vaccinated and re-vaccinated.		Square miles.	Population of area included in the last column.	Primary vacc		
							A.	B.	C.
	1873-74.	1872-73.	1873-74.	1872-73			Successful.	Unsuccessful including those doubtful.	Unknown.
Government	2	2	4,380	3,177	215,808	24,485,629	2,867	233	142
Municipal	48	51	59,116	57,554			44,129	3,326	4,565
Local Funds	202	201	368,053	317,516			326,852	16,161	19,292
Native States	125	119	191,331	182,661			171,657	8,958	9,460
Dispensaries	.....	.....	19,989	18,631			16,403	1,522	968
Army ... European ...	... ..	.....	1,122	1,517			1,122	.....	.....
Army ... Native... ...	4	4	8,232	7,013			5,245	524	125
Administration and Superintendence Charges.....	.....	.....	.....	.....			.....	.....	.....
Total...	381	377	652,223	588,069	215,808	24,485,629	568,275	30,724	34,552

Details of Column 3.

Total number of persons vaccinated	652,223
Deduct persons revaccinated	26,405
Number of persons primarily vaccinated...	625,818

Details of Pri

Total number of operations
Deduct persons vaccinated

Number of operations in

Figures, showing the Work by Establishments.

		7					8		9	10	11
nations.		Re-vaccinations.					Percentage of successful cases excluding those "unknown" from the total.		Average number of persons vaccinated by each vaccinator.	Amount expended.	Cost of each successful case.
D.	E.	A.	B.	C.	D.	E.					
Total.	Excess of operations over persons.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.			
										Rs. a. p.	Rs a. p.
3,242	34	494	660	18	1,172	.....	92·4	42·8	2,190	.....	.....
52,020	707	3,820	2,143	2,004	7,967	164	92·9	64·0	1,231	15,659 12 7	0 5 2
362,305	5,143	6,888	2,463	1,580	10,936	45	95·2	73·6	1,822	59,158 0 6	0 2 10
190,075	1,237	1,597	678	270	2,545	2	95·0	70·1	1,530	36,059 15 6	0 3 3
18,893	333	913	533	42	1,488	59	91·5	63·1	.....	.....	.....
1,122	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5,894	229	1,182	1,266	137	2,585	18	90·9	48·2	.....	.....	.....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1,05,198 11 9	.....
633,551	7,733	14,894	7,748	4,051	26,693	288	94·8	65·7	1,651	2,16,076 8 4	0 6 2

mary Vaccinations.

(Column 6 D.) ...	633,551
... ...	625,818
excess of persons,	7,733

Details of Re-vaccinations.

Total number of operations (Column 7 D.) ...	26,693
Deduct persons re-vaccinated	26,405
Number of operations in excess of persons...	288

A.—VACCINE

STATEMENT No. 1, *showing particulars of vaccination in each circle*

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.									
Presidency Circle.	Anantá Chandrobá, Assistant Surgeon.			1	1	359	310	City of Bombay.	19	16,601	Kolábá ...	153	153	62	158	12
						415	711			2,363	Fort, South ...	210	187	42	61	18
										29,732	Fort, North ...					
						311	937			10,464	Esplanade ...	106	98	14	55	5
						670	930			43,198	Market ...	354	279	15	442	131
				1	1	267	428			35,100	Mándví ...	126	124	6	180	52
						643	470			36,748	Chakhlá ...	193	170	...	84	236
				1	1	1,281	1,076			49,873	Umbarkhádi ...	179	137	32	142	98
						770	890			25,556	Dongari ...	350	294	6	548	42
				1	1	707	1,118			37,915	Dhobí Taláo ...	351	315	95	362	10
						230	382			20,760	Phanas Wádí...	126	99	8	210	...
						1,061	687			36,029	Bhuleshwar ...	226	162	10	220	126
				1	1	594	680			23,638	Khárá Taláo ...	238	176	10	147	218
						367	387			27,594	KumbhárWádá	177	163	3	295	25
						870	1,129			21,234	Khetwádi ...	451	358	25	627	60
				1	1	460	739			24,817	Girgaum ...	252	195	43	365	5
						145	169			7,531	Chowapátí ...	81	61	2	112	2
						185	219			7,741	Wálkeshwar ...	108	73	29	120	...
						172	414			4,317	Mahálakshumí.	88	83	10	149	5
				1	1	537	421			20,973	Mázgáon ...	271	204	93	288	30
						143	208			10,083	Tád Wádí ..	63	51	8	98	2
				1	1	1,145	1,099			46,996	Kámáthípurá:..	353	360	35	429	99
						1,029	694			28,032	Byculla ...	185	149	45	221	29
				1	1	481	593			13,773	Parel ...	277	202	37	359	23
						80	246			4,460	Shiwrí ...	43	37	1	70	7
				1	1	260	314			11,572	Sion ...	154	104	45	197	7
						521	599			14,310	Máhim ...	299	221	94	378	12
						70	186			10,042	Warli ...	44	25	5	64	...
				1	1	29	171			22,953	Harbour ...	3	...	2	...	1
						105	208			...	Out Stations ...	54	32	67	13	1
Total of Presidency Circle.		...	...	11	11	13,907	16,415		19	644,405		5,515	4,512	844	6,394	1,256

DEPARTMENT.

of superintendence, in the Bombay Presidency, during the Year 1873-74.

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.										Percentage of successful cases, excluding those "unknown" from the Total.		
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
6	68	211	95	279	30	2	311	5	10	42	1	53	...	90·2	19·2	
257	19	242	155	355	38	12	405	8	9	9	1	19	1	90·3	50·0	1,085
...	130	149	55	187	40	3	230	26	58	58	8	124	17	82·3	50·0	
40	5	417	216	540	71	43	654	21	7	6	25	38	1	88·3	53·8	
...	12	176	74	209	29	16	254	4	3	2	12	17	...	87·8	60·0	1,580
26	17	196	167	330	22	19	371	8	94	35	157	286	6	93·7	72·8	
3	41	179	137	256	45	23	324	8	256	314	395	965	...	85·0	44·9	
...	48	436	208	567	57	26	650	6	22	20	84	126	...	90·8	52·3	2,051
150	49	457	209	570	83	43	696	30	10	13	18	41	...	87·2	43·4	
7	...	182	43	195	26	11	232	7	1	...	4	5	...	88·2	100	1,998
12	20	232	156	318	41	36	395	7	166	93	442	701	28	88·5	64·0	
3	36	256	158	367	35	15	417	3	45	31	104	180	...	92·2	59·2	
...	17	247	93	267	61	16	344	4	2	1	24	27	...	81·4	66·6	1,831
60	37	546	263	700	93	24	817	8	28	11	22	61	...	88·2	71·7	
30	4	310	137	415	28	9	452	5	3	3	7	13	...	93·6	50·0	
19	7	96	46	131	15	1	147	5	2	1	...	3	...	89·7	66·6	
8	24	111	70	164	18	6	188	7	1	2	1	4	...	90·1	33·3	962
3	4	119	52	159	14	1	174	3	1	...	...	1	...	91·9	100	
16	48	283	192	427	49	9	485	10	21	9	34	64	2	89·7	70·6	
1	5	77	37	103	12	3	118	4	13	10	6	29	...	89·5	56·5	680
2	148	510	203	632	73	22	727	14	130	61	241	432	...	89·6	68·0	
...	39	230	104	269	55	17	341	7	346	330	22	698	3	83·0	51·1	2,174
10	50	304	175	407	79	15	501	22	1	...	1	2	...	83·7	100	
2	...	41	39	72	9	1	82	2	...	...	...	...	...	88·9	...	561
2	7	157	101	223	46	3	272	14	2	...	...	2	...	82·8	100	
7	29	295	225	438	106	6	550	30	...	1	...	1	...	80·3	..	851
...	...	36	33	54	9	7	70	1	1	...	...	1	...	85·7	100	
...	...	2	1	...	...	3	3	...	...	...	26	26	...	...	...	
1	4	48	38	31	3	54	88	2	...	18	12	30	11	91·1	...	134
665	868	6,545	3,482	8,665	1,187	446	10,298	271	1,232	1,070	1,647	3,949	69	87·9	53·5	1,264

1	2	3		4		5		6		7	8			Primary		
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.									
Central Circle.	P. S. Turnbull, M.D., Surgeon-Major, Acting—W. R. Gordon, M.B., Surgeon.															
		1	1	1	1	2,984	3,147	Púna Collectorate.	766	155,082	Haweli	1,566	1,418	...	2,657	37
				2	2	1,605	1,759		4	90,436	Puná City	873	731	47	1,163	197
				1	1	1,547	1,932		357	56,834	Máwal	777	770	...	1,286	8
				2	2	1,582	1,884		799	139,152	Khed	809	773	...	1,365	30
				2	2	1,668	912		600	106,876	Juner	826	841	...	1,550	44
				1	1	1,792	2,049		442	75,732	Purandhar	873	919	...	1,501	15
				1	1	778	1,035		558	76,984	Sirúr	380	398	...	628	30
				1	1	1,397	940		567	62,392	Indápur	717	680	...	1,222	35
				1	2	1,736	1,428		1,002	115,297	Bhimthadí	900	828	...	1,465	51
		1	1	12	13	15,089	15,086		5,095	878,785		7,721	7,358	47	12,837	447
				2	2	3,296	3,482	Ahmadnagar Collectorate.	548	105,905	Nagar	1,737	1,559	21	2,497	273
				1	1	2,718	988		469	59,093	Ráhurí	1,380	1,327	17	2,087	149
				1	1	1,019	959		731	82,422	Párner	511	508	...	834	59
				1	1	1,160	1,405		610	64,936	Srígundí	591	569	...	922	37
				1	1	1,689	1,643		567	48,766	Karjat	896	793	...	1,451	61
		1	1	1	1	1,908	1,854		621	62,418	Newásá	971	929	5	1,498	95
				1	1	1,440	1,542		676	60,591	Ankolá	713	723	...	1,307	22
				1	1	1,786	1,975		550	72,994	Jámkhed	939	847	...	1,530	80
				1	1	1,556	913		505	60,839	Kopargáon	777	778	5	1,252	77
				1	1	2,035	1,210		688	68,765	Sangamner	986	1,049	...	1,775	72
				1	1	1,425	1,103		682	83,226	Siogaon	759	666	...	1,204	89
		1	1	12	12	20,032	17,074		6,647	769,955		10,260	9,748	48	16,357	1,014
				2	2	3,765	3,420	Sholapur Collectorate.	841	180,587	Sholápur	2,049	1,716	8	2,576	531
				1	1	1,563	1,189		613	103,981	Mádhe	747	815	...	1,352	54
		1	1	1	1	2,027	2,003		762	105,291	Karmálá	1,071	954	...	1,760	59
				2	2	2,909	2,609		455	79,314	Pandharpur	1,479	1,427	...	2,406	130
				1	1	1,408	837		648	62,960	Sángolá	702	706	...	1,178	67
				2	2	2,329	1,595		606	130,853	Bársí	1,135	1,194	...	1,880	164
		1	1	9	9	14,001	11,653		3,925	662,986		7,183	6,812	8	11,152	1,005
				2	2	3,518	4,616	Sátárá Collectorate.	321	115,113	Sátárá	1,828	1,653	14	2,091	176
				0	0	...	...		5	4,006	Mahábleshwar	...	...	...	...	...
				1	1	1,812	1,768		324	87,975	Tasgaon	932	880	1	1,510	150
				1	1	1,961	1,897		433	59,836	Jawalí	994	964	...	1,741	30
				1	1	1,632	2,346		389	86,095	Waí	812	813	...	1,433	18
				1	1	1,609	1,459		500	81,950	Khatáw	811	798	...	1,396	42
		1	1	2	2	4,408	4,952		551	156,089	Wálwa	2,241	2,166	...	3,869	165
				1	1	1,332	910		627	62,198	Mán	667	665	...	1,057	15
				2	2	3,378	3,462		393	133,122	Karhád	1,718	1,656	...	2,952	95
				1	2	1,869	1,838		510	76,783	Khánápur	936	933	...	1,636	65
				1	1	2,684	2,578		409	115,491	Patan	1,358	1,317	...	2,230	47
				2	2	2,420	2,097		574	55,048	Málsiras	1,240	1,144	...	1,887	111
				1	1	2,138	1,704		342	82,344	Korégáon	1,092	1,046	...	1,776	68
		1	1	16	17	28,761	29,617		5,378	1,116,050		14,629	14,035	15	24,478	982

9									10					11		12
vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those "unknown" from the total.		Average number of persons vaccinated by each vaccinator.
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	290	1,158	1,826	2,782	69	152	3,003	19	...	...	...	...	...	97·5	...	2,984
19	178	1,173	431	980	43	581	1,604	...	...	...	1	1	...	95·7	...	802
...	253	352	1,195	1,408	38	103	1,549	2	...	...	...	...	...	97·3	...	1,547
...	187	866	716	1,463	72	47	1,582	...	...	...	...	...	...	95·3	..	791
...	73	483	1,184	1,217	186	273	1,676	9	1	...	...	1	...	86·7	100	834
...	276	790	1,002	1,705	44	43	1,792	...	...	...	...	...	...	97·4	...	1,792
...	120	471	307	743	41	14	798	20	...	...	...	...	...	94·7	...	778
..	140	584	813	1,265	111	58	1,434	37	...	...	...	...	...	91·9	...	1,397
...	212	773	955	1,484	104	153	1,741	13	7	...	1	8	...	93·4	100	1,736
19	1,729	6,650	8,429	13,047	708	1,424	15,179	100	8	...	2	10	...	94·8	100	1,257
6	499	1,855	1,441	3,176	51	81	3,308	12	...	...	...	...	...	98·4	...	1,648
...	454	1,639	1,068	2,569	59	103	2,731	24	11	...	...	11	...	97·7	100	2,718
...	126	462	557	925	65	30	1,020	1	...	...	...	...	...	93·4	...	1,019
...	201	520	640	1,089	37	46	1,172	12	...	...	...	...	...	96·7	...	1,160
...	177	984	705	1,670	20	19	1,709	20	...	...	...	...	...	98·8	...	1,689
...	302	1,007	893	1,771	64	92	1,927	27	8	...	...	8	...	96·5	...	1,908
...	107	366	1,070	1,264	36	150	1,450	14	...	...	4	4	...	97·2	...	1,440
...	176	840	946	1,667	71	64	1,802	16	...	...	...	...	...	95·9	...	1,786
...	221	752	803	1,477	52	60	1,589	34	1	...	...	1	...	96·5	100	1,556
...	188	1,063	972	1,867	97	81	2,045	10	...	...	...	...	...	95·0	...	2,035
...	132	438	987	1,304	68	83	1,455	30	...	...	...	...	...	95·0	...	1,425
6	2,583	9,926	10,082	18,779	620	809	20,208	200	20	...	4	24	...	96·8	100	1,669
...	650	2,061	1,704	3,261	132	386	3,779	14	...	...	...	...	...	96·1	...	1,882
...	156	926	636	1,374	137	69	1,580	18	...	1	...	1	...	90·9	...	1,563
...	206	633	1,392	1,647	176	278	2,101	76	...	2	...	2	...	90·3	...	2,027
...	370	1,613	1,293	2,433	71	409	2,913	7	1	2	...	3	...	97·1	33·3	1,454
...	163	769	639	1,170	177	108	1,455	47	...	...	...	...	...	86·8	...	1,408
...	285	1,199	1,130	2,008	109	221	2,338	9	...	...	...	...	...	94·8	...	1,164
...	1,830	7,201	6,794	11,893	802	1,471	14,166	171	1	5	...	6	...	93·6	16·6	1,555
3	297	1,597	1,884	3,316	105	87	3,508	27	19	5	13	37	...	96·9	79·1	1,759
...	...	...	...	...	...	...	...	...	...	...	...	...	..	...	...	.....
...	151	1,282	530	1,597	30	188	1,815	3	...	...	...	...	...	98·1	...	1,812
...	187	293	1,665	1,881	51	34	1,966	8	3	...	...	3	...	97·3	100	1,961
...	174	790	835	1,435	139	137	1,711	86	5	2	...	7	...	91·1	71·4	1,632
1	170	649	960	1,435	61	113	1,609	...	...	...	...	...	...	95·9	..	1,609
...	373	1,340	3,067	4,165	81	161	4,407	...	...	...	1	1	...	98·0	...	2,204
...	260	295	1,037	1,291	33	16	1,340	8	...	...	...	...	...	97·5	...	1,332
...	327	1,400	1,974	2,916	75	397	3,388	14	1	3	...	4	...	97·4	25·0	1,689
...	168	1,101	768	1,510	136	257	1,903	34	...	...	...	...	...	91·7	...	1,869
...	398	417	2,258	2,563	49	70	2,682	7	7	1	1	9	...	98·1	87·5	2,684
...	386	1,259	1,125	1,979	197	252	2,428	44	9	11	16	36	...	90·9	45·0	1,210
...	294	940	1,198	1,853	14	281	21,48	10	...	...	...	...	...	99·2	...	2,138
4	3,185	11,363	17,301	25,941	971	1,993	28,905	241	44	22	31	97	...	96·3	66·6	1,797

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.									
Central Circle—*concluded.*	P. S. Turnbull, M.D., Surgeon-Major; Acting—W. R. Gordon, M.B., Surgeon—	1	1	1	1	2,563	2,244	Ratnágirí Collectorate.	381	119,741	Ratnágirí ...	1,310	1,178	4	1,930	446
				2	2	5,452	6,065		728	177,134	Chiplún ...	2,681	2,594	...	4,523	223
				1	1	2,960	3,579		500	143,137	Dápulí ...	1,302	1,231	...	2,010	281
				1	1	5,687	5,340		508	118,921	Deogarh ...	2,823	2,755	58	4,933	86
				1	1	2,434	2,378		332	77,466	Goháगarh ...	1,100	1,140	180	2,028	32
				2	2	4,249	7,340		108	123,273	Málwan ...	2,010	1,966	87	3,700	18
				2	2	8,248	7,233		785	168,498	Rájápur ...	4,165	3,882	...	7,211	307
				1	1	2,372	3,003		447	90,966	Sangameshwar.	1,214	1,149	...	1,975	64
		1	1	11	11	33,965	37,182		3,789	1,019,136		16,605	15,895	329	28,310	1,457
		...	...	1	1	1,414	1,548	Native States.	498	81,068	Akalkot ...	793	621	...	1,085	192
				1	1	1,511	1,083		875	111,689	Bhor ...	773	738	...	1,422	4
				1	1	1,098	771		770	70,665	Jat ...	522	576	...	943	73
				1	1	387	730		118	58,980	Atpadí ..	199	188	...	367	8
				1	1	1,082	965		561	59,536	Phaltan ...	577	502	...	890	36
		...	...	5	5	5,492	5,097		2,822	381,938		2,864	2,625	...	4,707	313
Total of Central Circle.		5	5	65	67	117,340	115,709		27,656	4,828,850		59,262	56,473	447	97,841	5,218
Southern Circle.	J. Raby, Surgeon.	1	1	2	2	3,156	2,071	Belgaum Collectorate.	605	129,291	Belgáum ...	1,524	1,335	56	2,315	164
				1	1	1,935	1,731		409	131,504	Sampgáon ...	1,009	924	3	1,664	207
				1	1	1,825	1,241		638	120,691	Parasgarh ...	911	909	...	1,583	175
				2	2	2,254	1,801		668	109,697	Gokák ...	1,214	1,040	1	2,075	148
				2	2	3,608	2,123		848	248,685	Chikodí ...	1,896	1,711	...	3,181	292
				1	1	1,480	1,744		632	78,875	Bidí ...	734	743	35	1,318	80
				1	1	752	576		789	114,677	Athní ...	382	370	...	704	45
		1	1	10	10	15,010	11,287		4,589	933,420		7,670	7,032	95	12,840	1,111
		1	1	1	1	2,271	2,146	Dhárwád Collectorate.	460	123,730	Dhárwád ...	1,168	1,089	17	1,884	325
				1	1	1,291	957		565	104,700	Nawalgund ...	681	610	...	1,138	125
				1	1	1,976	1,618		341	83,175	Bankápur ...	1,089	878	...	1,638	295
				1	1	2,706	1,331		298	67,390	Hángal ...	1,406	1,300	...	2,296	287
				2	2	2,090	2,245		310	101,238	Hubli ...	1,075	1,013	16	1,721	336
				1	1	424	332		404	86,601	Ránibadnur ...	220	204	...	343	70
				1	1	1,004	1,161		399	79,099	Kod ...	524	480	...	905	95
				1	1	1,200	737		439	95,217	Karajghí ...	638	562	...	847	143
				1	1	1,286	1,046		279	52,729	Kalghatghí ...	661	623	12	1,066	151
				1	1	695	231		369	73,503	Ron ...	377	309	...	661	25
				2	2	1,601	1,513		701	120,655	Dambal ...	828	773	4	1,391	192
		1	1	13	13	16,544	13,317		4,565	988,037		8,667	7,841	49	13,890	2,044

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.										Percentage of successful cases, excluding those "unknown" from the total.		Average number of persons vaccinated by each vaccinator.
Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	108	497	1,991	2,138	157	258	2,553	65	37	30	8	75	...	93·1	55·2	2,563
...	529	1,231	4,044	5,159	104	66	5,329	54	86	68	23	177	..	98·0	55·8	2,726
...	242	519	2,014	2,354	66	159	2,579	46	263	92	72	427	...	97·2	74·0	2,960
...	501	1,252	4,326	4,948	228	531	5,707	129	39	50	20	109	...	95·5	43·8	5,687
...	...	475	1,765	1,992	129	220	2,341	101	115	60	19	194	...	93·9	65·7	2,434
...	171	588	3,388	3,813	230	67	4,110	134	132	138	4	274	1	94·3	48·8	2,124
...	529	1,092	6,955	7,445	254	463	8,162	115	128	50	23	201	...	96·7	71·9	4,124
...	324	758	1,605	2,326	41	29	2,396	33	9	...	...	9	...	98·2	100	2,372
...	2,404	6,412	26,088	30,175	1,209	1,793	3,3177	677	809	488	169	1,466	1	96·1	62·3	3,087
...	137	539	875	1,158	98	165	1,421	7	...	...	...	...	...	92·1	...	1,414
...	85	404	1,107	1,453	22	37	1,512	1	...	...	...	...	...	98·5	...	1,511
...	82	653	445	1,063	23	13	1,099	1	...	...	...	...	...	97·8	...	1,098
...	12	59	328	338	7	43	388	1	...	...	...	...	...	97·9	...	387
...	153	578	501	861	66	182	1,109	30	1	2	...	3	...	92·8	33·3	1,082
...	469	2,233	3,256	4,873	216	440	5,529	40	1	2	...	3	...	95·7	33·3	1,098
29	12,200	43,785	71,950	104708	4,526	7,930	117164	1,429	883	517	206	1,606	1	95·8	63·0	1,805
...	324	636	2,223	2,570	192	142	2,904	45	172	116	9	297	...	93·0	59·7	1,578
...	59	459	1,474	1,645	116	209	1,970	37	...	2	...	2	...	93·4	...	1,935
...	62	522	1,298	1,468	297	121	1,886	66	4	1	...	5	...	83·1	80·0	1,825
...	30	807	1,447	2,093	53	165	2,311	57	...	...	...	...	...	97·5	...	1,127
...	134	564	3,043	3,271	179	165	3,615	8	...	1	...	1	...	94·8	...	1,804
...	44	439	1,038	1,180	171	255	1,606	129	...	...	3	3	...	87·3	...	1,480
...	3	460	292	583	48	121	752	...	...	...	...	...	...	92·3	...	752
...	656	3,887	10,815	12,810	1,056	1,178	15,044	342	176	120	12	308	...	92·0	62·5	1,501
...	31	764	1,493	1,825	249	209	2,283	26	3	9	2	14	...	87·9	25·0	1,135
...	28	411	880	1,051	88	218	1,357	66	...	...	...	...	...	92·2	...	1,291
...	34	215	1,752	1,826	156	78	2,060	93	...	5	4	9	...	92·1	...	1,976
...	123	386	2,320	2,559	115	82	2,756	50	...	...	...	...	...	95·6	...	2,706
...	15	919	1,169	1,908	79	113	2,100	12	1	1	...	2	...	96·0	50·0	1,045
...	11	36	388	399	18	7	424	...	...	...	...	...	...	95·6	..	424
...	4	144	860	903	55	79	1,037	33	...	...	...	...	...	94·2	...	1,004
...	210	182	1,018	920	129	151	1,200	...	...	...	...	...	...	87·7	...	1,200
...	55	364	920	1,034	84	195	1,313	29	1	...	1	2	...	92·4	100·0	1,286
...	...	158	528	480	206	60	746	60	1	8	...	9	...	69·9	11·1	695
...	14	570	1,031	1,304	77	262	1,643	42	...	...	...	...	...	94·4	...	800
...	525	4,149	12,359	14,209	1,256	1,454	16,919	411	6	23	7	36	...	91·8	20·6	1,181

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Sex.		Caste.		
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.					Males.	Females.	Christian.	Hindu.	Musalman.
Southern Circle—*continued.*	J. Raby, Surgeon.	1	1	1	1	898	1,563	Kánadá Collectorate.	281	45,131	Kárwár ...	443	431	18	615	99
				2	2	3,520	1,704		660	90,042	Kumptá ...	1,790	1,612	28	3,176	78
				2	2	2,178	2,386		400	82,867	Honáwar ...	1,096	940	99	1,806	76
				1	1	929	680		550	58,099	Sirsí ...	447	366	6	626	...
				1	1	912	1,042		640	34,298	Ilápur ..	510	352	5	803	40
				1	1	2,045	1,422		594	34,183	Siddápur ...	1,144	861	...	1,831	6
				2	1	3,427	903		1,110	53,786	Haliál ...	1,785	1,473	55	3,088	20
		1	1	10	9	13,909	9,700		4,235	398,406		7,215	6,035	351	11,945	319
				2	3	2,891	2,058	Kaládgí Collectorate.	684	110,185	Bágalkot ...	1,476	1,363	3	2,341	311
				1	1	1,764	1,834		518	105,866	Hunugundá ...	853	909	...	1,501	172
				1	1	759	613		757	93,738	Bágewádí ...	397	357	...	614	102
		1	1	1	1	2,035	1,424		690	130,816	Badámí ...	1,041	994	...	1,859	129
				1	1	1,722	929		552	83,848	Mudebihál ...	867	833	...	1,449	196
				1	1	1,155	763		837	105,475	Indí ...	586	568	...	999	121
				1	1	1,394	841		792	99,798	Sindghí ...	712	682	...	1,134	162
				2	2	2,388	1,755		865	86,311	Bijápur ...	1,165	1,171	...	1,847	400
		1	1	10	11	14,108	10,217		5,695	816,037		7,097	6,877	3	11,744	1,593
		...	...	1	1	6,257	6,528	Sáwantwádí.	900	190,814	Sáwantwádí ...	2,662	2,520	50	5,076	54
				1	1	837	812	Southern Maráthá States.	1,207	152,765	Sánglí ...	431	406	...	731	65
				1	...	190	...			44,630	Shirhatti ...	88	102	...	158	32
				1	...	154	...			26,268	Mangalvedhá...	75	79	...	139	13
				1	1	703	672		574	63,280	Miraj, 1st ...	375	328	...	575	97
				1	...	436	...			18,921	Lakshmeshwar.	207	229	...	400	36
				1	1	984	559		197	35,601	Miraj, 2nd ...	639	345	...	923	61
				1	1	1,627	462		271	39,420	Kurandwád, 1st	882	745	10	1,418	65
				1	1	573	467		177	30,251	Do., 2nd	280	289	...	439	77
				1	1	1,208	913		317	58,921	Mudhol ...	632	576	...	1,070	79
				1	1	859	467		189	38,031	Rámdurg ...	401	432	1	764	60
				1	2	636	1,090		Un-	79,830	Jamkhandi ...	340	296	..	565	60
				1		1,055			known	22,516	Kundegal ...	523	530	...	878	128
				1	1	389	515		70	17,288	Sávanur ...	189	186	...	219	95
		...	...	13	10	9,651	5,957		3,002	627,722		5,062	4,543	11	8,279	868

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	2	92	782	558	191	160	909	35	14	6	4	24	...	74·4	70·0	898
...	120	258	3,144	3,197	135	71	3,403	1	75	32	11	118	...	95·9	70·0	1,760
...	55	113	1,923	1,714	285	39	2,038	2	85	44	13	142	...	85·7	65·8	1,089
...	181	68	745	659	73	89	821	8	51	55	10	116	...	90·0	48·1	929
...	14	40	822	605	83	192	880	18	27	13	10	50	...	87·9	67·5	912
...	168	106	1,899	1,805	97	103	2,005	...	27	11	2	40	...	94·9	71·0	2,045
...	95	133	3,125	2,947	133	213	3,293	35	135	17	17	169	...	95·6	88·8	1,713
...	635	810	12,440	11,485	997	867	13,349	99	414	178	67	659	...	92·0	69·9	1,390
...	184	1,123	1,716	2,344	202	348	2,894	55	3	46	3	52	...	92·0	6·1	1,445
...	89	453	1,309	1,664	71	98	1,833	71	2	...	...	2	...	95·9	100	1,764
...	38	183	571	632	62	68	762	8	4	...	1	5	...	91·0	100	759
...	47	573	1,462	1,950	25	85	2,060	25	...	...	...	...	...	98·7	...	2,035
...	55	534	1,166	1,289	172	274	1,735	35	4	5	13	22	...	88·2	44·4	1,722
...	34	286	868	937	86	189	1,212	58	1	...	...	1	...	91·6	100	1,155
...	98	439	955	1,201	111	85	1,397	3	...	...	...	...	...	91·1	...	1,394
...	89	841	1,495	2,042	101	206	2,349	13	14	25	13	52	...	95·2	35·9	1,194
...	634	4,432	9,542	12,059	830	1,353	14,242	268	28	76	30	134	...	93·5	26·9	1,410
...	2	1,247	3,935	5,040	229	23	5,292	110	654	403	18	1,075	...	95·6	61·8	6,257
...	41	484	353	691	67	83	841	4	...	...	...	...	...	91·1	...	837
...	...	55	135	113	8	69	190	...	...	...	...	...	...	93·3	...	190
...	2	33	121	134	10	14	158	4	...	...	...	...	...	93·0	...	154
...	31	352	351	670	13	20	703	...	...	...	...	...	...	98·0	...	703
...	...	60	376	401	32	9	442	6	...	...	...	...	...	92·6	...	436
...	...	532	452	982	2	...	984	...	...	...	...	...	...	99·7	...	984
...	134	335	1,292	1,549	65	46	1,660	33	...	...	...	...	...	95·9	...	1,627
...	53	160	409	500	35	38	573	4	3	1	...	4	...	93·4	75·0	573
...	59	167	1,041	533	634	46	1,213	5	...	...	...	...	...	45·6	...	1,208
...	8	308	525	766	44	23	833	...	1	15	10	26	...	94·5	6·2	859
...	11	163	473	401	71	216	688	52	...	...	...	...	...	84·9	...	636
...	47	632	421	820	94	167	1,081	28	...	...	2	2	...	89·7	...	1,055
...	61	85	290	312	54	30	396	21	8	1	5	14	...	85·2	88·8	389
...	447	3,366	6,239	7,872	1,129	761	9,762	157	12	17	17	46	...	87·4	41·3	742

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.									
Southern Circle—*concld.*	J. Raby, Surgeon.	1	1	1	1	1,715	2,070	Kolhápur States.	360	32,414	Vishálgarh ...	877	836	...	1,466	33
				1	1	1,924	1,777		567	59,330	Ichalkaranjí ...	986	938	...	1,677	98
				1	1	1,582	1,911		252	47,801	Kágal ...	805	777	...	1,393	62
				1	1	1,455	1,458		486	128,204	Gadhinglaj ...	764	691	34	1,301	67
				1	1	1,556	1,271		486	43,439	Báurá ...	781	775	...	1,389	12
				1	1	1,811	2,535		540	106,714	Panálá ...	934	877	...	1,511	32
				1	1	1,946	2,313		900	91,148	Buthargarh ...	943	1,003	20	1,721	49
				1	1	1,483	976		243	79,722	Shirol ...	771	712	...	1,234	104
				1	1	877	325		180	84,464	Torgal ...	461	416	..	776	64
				1	1	913	1,132		598		Ajrá ...	484	429	...	854	9
				1	1	2,305	2,797		506	129,455	KolhápurPetha	1,209	1,090	...	2,020	24
Total of Southern Circle.		1	1	11	11	17,567	18,565		5,118	802,691		9,015	8,544	54	15,342	554
		5	5	68	65	93,046	75,571		28,104	4,757,127		47,388	43,392	613	79,116	6,543
Western Circle.	T. Cody, Surgeon.			2	2	1,058	1,345	Thánà Collectorate.	164	93,324	Salsette ...	512	510	168	763	45
				1	1	1,191	1,286		216	61,089	Bassein ...	594	590	327	806	5
				1	1	1,004	2,246		244	74,267	Bhiwandi ...	510	494	...	898	19
				1	1	1,284	1,168		259	72,556	Kalián ...	627	652	...	1,196	33
				1	1	1,077	1,076		644	110,423	Dahánù ...	509	506	...	982	...
		1	1	1	1	1,036	1,401		343	77,150	Karjat ...	522	511	...	1,004	5
				1	1	1,109	787		413	71,974	Máhim ...	574	534	1	1,066	7
				1	1	1,071	1,333		345	57,203	Murbád ...	563	496	...	936	7
				2	2	1,435	2,423		285	96,714	Panwel ...	737	698	1	1,352	29
				1	1	2,287	1,972		849	100,304	Sháhpur ...	1,176	1,104	4	2,208	37
				1	1	975	902		290	32,420	Wádá ...	494	460	...	795	18
		1	1	13	13	13,527	15,939		4,052	847,424		6,818	6,555	501	12,006	205
				1	1	1,444	1,739	Kolábá Collectorate.	192	66,947	Alibág ...	724	715	1	1,362	34
				1	1	1,862	1,709		346	72,773	Mángaon ...	965	852	...	1,515	97
		1	1	1	1	2,188	1,138		455	105,365	Mahád ...	1,156	996	...	2,034	36
				1	1	1,990	2,232		192	43,962	Pen ...	971	1,005	...	1,953	8
									105	19,401	Nagotna Petha					
				1	1	391	900		192	41,997	Roha ...	188	203	...	336	16
		1	1	5	5	7,875	7,718		1,482	350,405		4,004	3,771	1	7,200	191
				1	1	1,731	402	Násik Collectorate.	444	67,835	Násik ...	855	875	...	1,558	27
				1	1	712	693		2	22,436	Násik Town...	332	351	4	577	96
				1	1	1,018	1,587		672	57,735	Igatpurí ...	509	504	...	891	8
				1	1	1,450	820		370	86,017	Niphád ...	727	721	...	1,350	46
				1	1	1,617	828		323	50,130	Chándùr ...	818	799	...	1,394	96
				1	1	1,399	981		507	64,872	Sinnar ...	698	700	...	1,326	36
		1	1	1	1	1,396	1,944		775	66,956	Máligám ...	723	673	...	1,246	40
									1200	37,501	Abhoná Pethá					
				1	1	1,927	1,237		720	47,250	Báglán ...	981	935	...	1,803	54
									700	28,452	JaikhedaPethá					
				1	1	1,354	485		424	30,230	Nándgáon ...	585	647	...	1,061	24
				1	1	1,193	618		482	59,313	Sáwargáon ...	580	613	1	965	45
				1	1	1,447	1,529		560	68,626	Dindorí ...	704	743	...	1,353	14
		1	1	11	11	15,244	11,124		7,179	687,353		7,512	7,561	5	13,524	486

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Percentage of successful cases, excluding those "unknown" from the total. In primary vaccinations.	Percentage of successful cases, excluding those "unknown" from the total. In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	214	435	1,278	1,640	49	24	1,713	...	...	2	...	2	...	97·0	...	1,715
...	149	1,209	715	1,839	8	80	1,927	3	...	...	...	...	...	99·5	...	1,924
...	127	426	1,156	1,650	51	185	1,586	4	...	...	...	...	...	96·7	..	1,582
...	53	151	1,304	1,214	95	148	1,457	2	...	...	...	...	...	92·7	...	1,455
...	155	187	1,369	1,314	78	176	1,568	12	...	...	...	...	...	94·3	...	1,556
...	268	394	1,417	1,749	15	47	1,811	...	...	...	...	...	...	99·1	...	1,811
...	156	182	1,764	1,893	47	23	1,963	17	...	...	...	...	...	97·5	...	1,946
...	145	865	618	1,422	37	45	1,504	21	...	...	...	...	...	97·4	...	1,483
...	37	270	607	812	21	57	890	13	...	...	...	...	...	97·4	...	877
...	50	303	610	894	52	16	962	49	...	...	...	...	...	94·5	...	913
...	255	409	1,890	2,081	120	99	2,300	1	1	3	2	6	...	94·5	25·0	2,305
...	1,609	4,831	12,728	16,208	573	900	17,681	122	1	5	2	8	...	96·5	16·6	1,597
...	4,508	22,722	68,058	79,683	6,070	6,536	92,289	1,509	1,291	822	153	2,266	...	92·9	61·0	1,348
13	33	467	555	924	56	47	1,027	5	19	7	10	36	...	94·2	73·0	529
...	46	731	453	1,142	59	6	1,207	23	1	6	...	7	...	95·0	14·2	1,191
...	87	174	830	889	130	38	1,057	53	...	...	...	...	...	87·2	...	1,004
...	50	526	753	1,134	114	59	1,307	28	1	2	2	5	..	90·8	33·0	1,284
...	33	431	584	903	120	30	1,053	38	45	13	4	62	...	88·2	77·5	1,077
...	24	531	502	884	94	55	1,033	...	...	3	...	3	...	93·3	...	1,056
20	14	427	681	1,057	39	26	1,122	14	1	...	...	1	...	96·4	100	1,109
...	116	537	522	952	74	54	1,080	21	9	3	...	12	...	92·7	75·0	1,071
3	50	1,027	408	1,201	175	113	1,489	54	...	...	...	...	...	87·2	...	717
...	31	447	1,833	2,202	80	...	2,282	2	7	...	...	7	...	96·4	100	2,287
...	141	149	805	722	178	77	977	23	3	18	...	21	...	80·2	14·2	975
36	625	5,447	7,926	12,010	1,119	505	13,634	261	86	52	16	154	...	91·4	62·3	1,040
...	42	1,072	367	1,280	41	109	1,439	...	2	2	1	5	...	96·9	50·0	1,444
...	205	944	873	1,599	123	139	1,861	44	31	10	4	45	...	92·8	75·6	1,862
..	82	401	1,751	1,857	221	91	2,169	17	23	10	3	36	...	89·3	69·7	2,188
...	15	1,404	572	1,937	64	6	2,007	31	6	8	...	14	...	96·8	42·8	1,990
...	39	185	206	329	62	12	403	12	...	...	..	...	...	84·1	..	591
...	383	4,006	3,769	7,011	511	357	7,879	104	62	30	8	100	...	93·2	67·3	1,575
...	145	570	1,160	1,390	83	309	1,782	52	1	...	...	1	...	94·3	100	1,751
1	5	263	420	557	79	48	684	1	12	17	..	29	...	87·5	41·3	712
...	114	134	879	841	109	91	1,041	28	5	...	...	5	...	88·5	100	1,018
..	52	571	877	1,198	64	190	1,452	4	2	...	...	2	...	94·9	100	1,450
...	127	851	766	1,542	73	56	1,671	54	...	...	...	...	...	95·4	...	1,617
...	36	638	760	1,099	173	132	1,404	6	1	...	...	1	..	86·4	100	1,399
...	110	594	802	1,297	50	95	1,442	46	...	...	...	...	...	96·2	...	1,396
...	59	707	1,209	1,761	113	79	1,953	37	9	2	...	11	...	93·9	81·8	1,927
...	147	404	828	994	299	68	1,361	129	65	44	13	122	...	76·8	59·6	1,354
...	182	659	534	1,014	144	35	1,193	...	...	...	...	...	...	87·5	...	1,193
...	80	451	996	1,415	13	28	1,456	9	...	...	...	...	...	99·0	..	1,447
1	1,057	5,842	9,231	13,108	1,200	1,131	15,439	366	95	63	13	171	..	91·6	60·1	1,386

1	2	3		4		5		6		7	8			Primary		
												A.		B.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Sex.		Caste.		
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.					Males.	Females.	Christian.	Hindú.	Musalmán.
Western Circle—*concluded.*	T. Cody, Surgeon.	2	1	2	2	2,582	2,685	Khándesh Collectorate.	759	66,929	Dhúliá ...	1,321	1,260	4	2,161	120
				1	1	1,700	1,366		867	124,519	Sáwadá ...	813	886	...	1,524	61
				1	1	1,260	1,146		319	60,109	Nasirábád ...	588	672	...	1,159	70
				1	1	2,285	2,669		467	76,689	Irandol ...	1,164	1,116	1	2,071	93
				1	1	1,997	2,161		527	70,351	Jámner ...	1,030	949	...	1,654	101
				1	1	1,313	809		780	34,642	Sherpur ...	667	602	...	1,213	42
				1	1	2,010	956		468	46,228	Sháhádé ...	980	1,003	...	1,497	69
				1	1	669	246		1,135	35,278	Talode ...	321	348	...	650	2
				1	1	902	1,314		647	45,285	Nandurbár ...	435	467	...	866	20
				1	1	1,573	1,260		511	44,568	Chálisgáon ...	815	758	...	1,417	62
				1	1	2,088	1,902		1,039	60,125	Pimpalner ...	1,051	1,031	...	2,080	2
				1	1	1,257	860		542	84,880	Páchorá ...	633	624	...	1,193	48
				1	1	1,805	1,819		495	51,581	Chopde ...	911	871	...	1,517	89
				1	1	1,292	1,489		529	79,863	Amalner ...	677	615	...	1,127	78
				1	1	2,375	2,171		507	63,350	Virdal ...	1,170	1,205	...	1,774	87
				1	1	1,186	1,099		570	84,245	Bhosáwal ...	601	585	13	963	96
		2	1	17	17	26,294	23,952		10,162	1,028,642		13,177	12,992	18	22,866	1,040
				1	1	2,044	1,081	Native States.	534	37,406	Jawár ...	1,017	1,027	...	1,909	...
				1	1	2,982	1,364		150	71,996	Janjírá ...	1,456	1,519	...	2,280	457
				1	1	990	534		960	47,033	Penth ...	486	504	...	988	2
		...	...	3	3	6,016	2,979		1,644	156,435		2,959	3,050	...	5,177	459
Total of Western Circle.		5	4	49	49	68,956	61,712		24,519	3,070,259		34,470	33,929	525	60,773	2,381
Eastern Gujaráth Circle.	Mancharji Beramji Colá, M. D.	1	1	1	1	2,598	2,733	Khedá Collectorate.	166	85,754	Mahmudábád.	1,248	1,008	...	1,938	202
				1	1	2,481	2,398		217	78,673	Mátar ...	1,200	1,068	...	1,931	220
				2	2	3,795	3,933		223	151,483	Nariád ...	1,996	1,641	...	2,998	344
				1	1	1,786	1,874		279	86,742	Kapatbanj ...	909	810	...	1,518	130
				1	1	1,708	2,062		246	85,601	Thásrá ...	881	827	...	1,366	182
				2	2	1,549	2,691		237	149,952	A'nand ...	837	698	...	1,394	87
				1	1	4,362	4,119		193	144,528	Borsad ...	2,319	1,973	8	3,726	194
		1	1	9	9	18,279	19,810		1,561	782,733		9,480	8,025	8	14,871	1,359
		1	1	1	1	1,409	1,505	Panch Mahals.	678	74,014	Godhrá ...	712	690	...	1,358	11
				1	1	2,343	1,706		325	63,513	Dohad ...	1,139	1,153	...	2,129	99
				1	1	1,448	1,474		153	40,505	Kalol ...	721	694	...	1,298	40
				1	1	1,797	1,492		200	36,785	Jhálod ...	974	813	...	1,762	20
				1	1	1,001	773		375	25,926	Halol ...	481	493	...	759	12
		1	1	5	5	7,998	6,950		1,731	240,743		4,027	3,843	...	7,306	182

9									10					11	12
Vaccine operations.									Re-vaccinations.						
		C.		D.			E.	F.	A.	B.	C.	D.	E.		
		Age.		Result.											
Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Percentage of successful cases, excluding those "unknown" from the total.	Average number of persons vaccinated by each vaccinator.
														In primary vaccinations. / In re-vaccinations.	
...	296	1,292	1,289	2,547	29	12	2,588	7	1	...	...	1	...	98·8 / 100	1,291
...	114	1,036	663	1,640	47	20	1,707	8	1	...	...	1	...	97·2 / 100	1,700
...	31	590	670	1,126	8	126	1,260	...	...	...	...	...	...	99·2 / ...	1,260
...	115	479	1,801	2,039	62	184	2,285	5	5	...	...	5	...	97·0 / 100	2,285
...	224	612	1,367	1,769	118	167	2,054	75	13	4	1	18	...	93·7 / 76·4	1,997
...	14	615	654	1,236	179	8	1,423	154	44	...	...	44	...	83·3 / 100	1,513
...	417	627	1,356	1,895	175	52	2,122	139	18	9	...	27	...	91·5 / 66·6	2,010
...	17	256	413	627	34	26	687	18	...	...	...	...	...	94·8 / ...	669
...	16	373	529	809	61	32	902	...	...	...	...	...	...	92·9 / ...	902
...	94	508	1,065	1,394	44	155	1,593	20	...	...	...	...	...	96·9 / ...	1,573
...	...	479	1,603	1,930	48	137	2,115	33	...	1	5	6	...	97·5 / ...	2,088
...	16	324	933	1,132	74	68	1,274	17	...	...	...	...	...	93·8 / ...	1,257
...	176	617	1,165	1,712	41	29	1,782	...	14	6	3	23	...	97·6 / 70·0	1,805
...	87	264	1,028	1,231	83	68	1,382	90	...	...	...	...	...	93·6 / ...	1,292
...	514	562	1,813	2,152	17	219	2,388	13	...	...	...	..	...	99·2 / ...	2,375
...	114	626	560	1,127	36	23	1,186	...	...	...	...	...	...	96·0 / ...	1,186
...	2,245	9,260	16,909	24,366	1,056	1,326	26,748	579	96	20	9	125	...	95·8 / 83·1	1,547
...	135	284	1,760	1,963	57	24	2,044	...	...	...	...	...	...	97·1 / ...	2,044
...	238	651	2,324	2,728	167	155	3,050	75	6	1	...	7	...	94·2 / 85·7	2,982
...	...	62	928	915	26	49	990	...	...	...	...	..	...	97·2 / ...	990
...	373	997	5,012	5,606	250	228	6,084	75	6	1	...	7	...	95·7 / 85·7	2,005
37	4,683	25,552	42,847	62,101	4,136	3,547	69,784	1,385	345	166	46	557	...	93·7 / 67·5	1,407
1	115	1,702	554	2,033	99	141	2,273	17	171	116	55	342	...	95·3 / 59·5	2,598
...	207	1,312	1,046	2,067	187	113	2,367	9	64	36	23	123	...	91·7 / 64·0	2,481
...	295	2,317	1,320	3,374	170	102	3,646	9	96	35	27	158	...	95·2 / 73·2	1,897
...	71	1,051	668	1,610	51	58	1,719	...	43	12	12	67	...	96·9 / 78·1	1,786
...	160	1,095	613	1,653	48	7	1,708	...	...	...	...	...	...	97·1 / ...	1,708
...	54	805	730	1,281	173	107	1,561	26	8	...	6	14	...	88·1 / 100	774
...	364	2,903	1,389	3,853	436	129	4,418	126	26	31	13	70	...	89·8 / 45·6	4,362
1	1,266	11,185	6,320	15,871	1,164	657	17,692	187	408	230	136	774	...	93·1 / 63·9	2,031
...	33	562	840	1,360	41	4	1,405	3	3	4	...	7	...	97·0 / 42·8	1,409
...	64	797	1,495	2,224	100	16	2,340	48	36	15	...	51	...	95·6 / 70·5	2,343
1	76	966	449	1,384	23	32	1,439	24	21	...	12	33	...	98·3 / 100	1,448
...	5	365	1,422	1,701	41	73	1,815	28	6	3	1	10	...	97·6 / 66·6	1,797
...	203	404	570	904	56	14	974	...	23	4	...	27	...	94·1 / 85·1	1,001
1	381	3,094	4,776	7,573	261	139	7,973	103	89	26	13	128	...	96·6 / 77·3	5,199

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.									
Eastern Gujarath Circle—*concluded.*	Mancharji Beramji Cola, M.D.			2	2	3,197	2,399	Broach Collectorate.	250	110,291	Broach ...	1,659	1,514	3	2,128	723
				1	1	2,399	2,694		348	93,249	Jambusar ...	1,222	1,172	...	1,666	414
		1	1	1	1	1,058	537		169	40,260	Amod ...	541	498	...	739	206
						953	739		304	38,779	Wágra ...	496	455	...	771	90
				1	1	1,525	1,542		134	41,087	Ankleshwar.	749	745	...	1,220	110
									153	26,656	Hansot Petha					
		1	1	5	5	9,132	7,911		1,358	350,322		4,667	4,384	3	6,524	1,543
				1	1	2,791	2,453	Surat Collectorate.	3	107,149	Súrat City ...	1,233	1,089	8	1,746	327
				1	1	794	2,094		67	48,435	Chorási ...	422	370	...	715	17
				1	1	1,901	1,209		355	66,256	Ulpád ...	922	903	...	1,467	137
				1	1	1,831	1,578		184	70,112	Jalálpur ...	935	889	...	1,619	73
		1	1	1	1	2,690	2,152		261	77,500	Bardoli ...	1,330	1,350	...	2,621	50
				1	1	1,768	1,571		172	48 367	Mándví ...	882	841	...	1,563	135
				1	1	2,170	1,718		167	59,312	Chiklí ...	976	912	...	1,559	142
				1	1	1,796	1,478		217	78,207	Balsád ...	879	889	1	1,668	41
				1	1	1,617	1,423		162	51,749	Pardí ...	819	789	...	1,409	24
		1	1	9	9	17,358	15,676		1,588	607,087		8,398	8,032	9	14,367	946
						1,059	722	Mahi Kantha	4,000	42,300	WátrakKanthá	557	464	1	873	40
				1	1	191	436			30,114	Rhevar ...	94	89	...	174	1
						1,480	...			...	Nani Marwad.	778	698	...	1,423	27
				1	1	863	825			38,478	Bávesí ...	457	390	...	755	18
						2	741			22,876	Katosan ...	2	...	...	2	...
				1	1	1,814	1,978			217,382	I'dar ...	967	845	...	1,679	45
				1	1	1,763	1,230			54,316	A'mnagar ...	941	822	...	1,524	152
				1	1	512	982			41,590	Sábar Kánthá	281	231	...	429	58
		...	...	5	5	7,684	6,914		4,000	447,056		4,077	3,539	1	6,859	341
				2	2	2,191	1,726	Rewa Kantha States.	1,736	74,813	Lúnwádá ...	1,085	1,068	...	1,915	101
				2	2	3,100	3,306		4,500	102,036	Rájpípla ...	1,639	1,450	...	2,968	92
				2	2	3,822	3,692		1,600	52,421	Báriá ...	1,934	1,888	...	3,467	6
				1	1	1,091	728		400	41,984	Bálásinúr ...	535	553	...	964	8
				1	1	549	510		3,000	62,913	Chotá Udaipur	243	296	...	529	2
				1	1	1,734	944		900	62,364	Sunth ...	846	887	...	1,713	20
						..	...				Kadáná ...	...	...	...	...	...
				1	1	888	932		400	46,966	Sankhedá Mewás	435	446	...	823	49
		...	...	10	10	13,375	11,838		12,536	443,497		6,717	6,588	...	12,379	278
				1	1	2,341	1,855	Cambay ...	350	117,203	Cambay ...	1,208	1,072	...	1,917	160
				1	1	2,725	2,189	Dharmpur.	2,650	74,592	Dharmpur ...	1,357	1,357	...	2,258	11
				1	1	2,860	1,457	Bansda ...		32,154	Bánsdá ...	1,503	1,357	...	2,767	9
				*	...	348	...	Sachin ...		17,103	Sachin ...	190	158	...	340	6
		...	...	3	3	8,274	5,501		3,000	241,052		4,258	3,944	...	7,282	186
Total of Eastern Gujarath Circle.		4	4	46	46	82,100	74,600		25,774	3,112,490		41,624	38,355	21	69,588	4,835

* The Chorási vaccinator vaccinated in the Sachin villages.

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.										Percentage of successful cases, excluding those "unknown" from the total.		Average number of persons vaccinated by each vaccinator.
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
43	816	1,786	1,387	2,861	59	269	3,189	16	18	2	4	24	...	97·9	90·0	1,598
...	314	1,531	863	2,219	74	104	2,397	3	3	...	2	5	...	96·7	100	2,399
1	93	445	594	1,000	31	19	1,050	11	4	11	4	19	...	96·9	26·6	
...	90	439	512	907	45	14	966	15	2	...	...	2	...	95·2	100	2,011
...	164	911	583	1,410	46	48	1,504	10	22	8	1	31	...	96·8	73·3	1,525
44	937	5,112	3,939	8,397	255	454	9,106	55	49	21	11	81	...	97·0	70·0	1,826
120	121	1,265	1,057	1,915	220	195	2,330	8	151	185	133	469	...	89·6	44·9	2,791
11	49	462	330	630	120	45	795	3	2	...	...	2	...	84·0	100	794
19	202	680	1,145	1,657	98	71	1,826	1	50	13	13	76	...	94·4	79·3	190
2	130	906	918	1,408	265	154	1,827	3	5	1	1	7	...	84·1	83·3	1,831
6	3	757	1,923	2,641	26	29	2,696	16	10	...	...	10	...	99·0	100	2,690
6	19	797	925	1,654	18	61	1,733	10	33	5	8	46	1	98·9	86·8	1,768
2	185	1,380	508	1,860	3	25	1,888	...	208	53	21	282	...	99·8	79·6	2,170
2	56	348	1,420	1,634	31	109	1,774	6	23	1	4	28	...	98·1	95·8	1,796
32	143	962	646	1,453	57	120	1,630	22	6	...	3	9	...	96·2	100	1,617
200	908	7,557	8,873	14,852	838	809	16,499	69	488	258	183	929	1	94·6	65·4	1,928
...	107	462	559	866	102	63	1,031	10	15	22	1	38	...	89·4	40·5	
...	8	65	118	138	24	36	198	15	7	...	1	8	...	85·1	100	2,730
...	26	242	1,234	1,256	192	50	1,498	22	1	3	...	4	...	86·7	25·0	
...	74	313	534	698	83	73	854	7	...	11	5	16	...	89·3	...	
...	...	2	...	...	...	2	2	...	...	...	...	...	...	...	...	865
...	88	640	1,172	1,645	128	44	1,817	5	2	...	...	2	...	92·7	100	1,814
...	87	655	1,108	1,641	99	34	1,774	11	...	...	...	...	...	94·3	...	1,763
...	25	278	234	483	22	12	517	5	...	...	...	...	...	95·6	...	512
..	415	2,657	4,959	6,727	650	314	7,691	75	25	36	7	68	...	91·1	40·9	1,536
...	137	666	1,487	2,045	80	43	2,168	15	31	4	3	38	...	96·2	88·5	1,095
...	29	1,185	1,904	2,983	132	21	3,136	47	9	2	...	11	...	95·7	81·8	1,550
...	349	687	3,135	3,688	87	78	3,853	31	...	...	...	...	...	97·6	...	1,911
...	116	192	896	980	71	37	1,088	...	3	...	...	3	...	93·2	100	1,091
...	8	66	473	472	70	8	550	11	6	4	...	10	...	87·0	60·0	549
...	...	96	1,637	1,588	107	62	1,757	24	...	1	...	1	...	93·6	...	
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,734
...	9	266	615	794	36	58	888	7	4	2	1	7	...	95·6	66·6	888
..	648	3,158	10,147	12,550	583	307	13,440	135	53	13	4	70	...	95·5	80·3	1,337
2	201	1,324	956	2,195	79	27	2,301	21	41	16	4	61	...	96·5	71·9	2,341
2	443	510	2,204	2,564	57	96	2,717	3	11	...	...	11	...	97·8	100	2,725
...	84	190	2,670	2,680	100	80	2,860	...	...	...	...	...	...	96·4	...	2,860
2	...	135	213	278	36	34	348	...	...	...	...	...	...	88·5	...	348
6	728	2,159	6,043	7,717	272	237	8,226	24	52	16	4	72	...	96·5	76·4	2,758
252	5,283	34,922	45,057	73,687	4,023	2,917	80,627	648	1,164	600	358	2,122	1	94·8	65·9	1,784

1	2	3		4		5		6		7	8						
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary					
												A.		B.			
												Sex.		Caste.			
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.					Males.	Females.	Christian.	Hindu.	Musalman.	
Western Gujaráth Circle.	E. R. Butler, M.D., Surgeon-Major.			1	1	2,000	2,186	Ahmadábád Collectorate.	306	130,619	Daskroi ...	993	929	10	1,626	103	
				2	2	4,580	4,913		2	116.873	Ahmadabad City.	4,869	1,844	9	2,668	802	
				2	2	2.546	2.458		650	113,375	Dholká ...	1,144	1,124	...	1,710	269	
				2	2	4.690	2,319		1,203	124,860	Dhandúká ...	2,271	2,101	...	3,696	389	
		1	1	2	2	3,045	2.931		655	128,044	Veramgáon ...	1,559	1,342	...	2,498	243	
				1	1	1,892	1,503		356	73.229	Sánand ...	1,001	822	...	1,516	89	
				1	1	1,686	1,577		266	71,072	Prántej ...	875	794	...	1,354	209	
						...	...		180	35,862	Morasá Pethá.						
				1	1	1,081	2,241		223	33,829	Gogo ...	514	531	...	858	44	
		1	1	12	12	21,520	20,108		3,841	827,754		10.226	9,487	19	15,926	2,148	
				1	1	1,561	1,210	Pálanpur States.	864	59,156	Dísá ...	833	708	...	1,317	157	
				1	1	2,785	2,959		1,188	136.303	Pálanpur ...	1,490	1,295	...	1,815	574	
				1	1	945	1.127		1.012	29.858	Dhanerá ...	477	468	...	820	33	
				1	1	2,105	1,094		1,080	37,771	Kákhrej ...	1,080	1,004	...	1,884	54	
						73	412		495	19,701	Deodar ...	43	30	...	68	3	
						...	202		162	7.338	Tehrwádá ...	...	...	...	...	...	
				1	1	1,039	585		382	23.081	Wáo ...	547	492	...	918	23	
						650	1,343		1,989	44.510	Tharád ...	307	314	...	486	49	
						78	567		472	13,574	Sántalpur ...	37	41	...	69	7	
						258	259		578	6,995	Morewádá ...	139	119	...	215	16	
						794	50		362	20,096	Wárye ...	429	364	...	599	114	
				1	1	51	157		157	3,983	Charchat ...	28	23	...	46	1	
						...	...		...	636	Jajhám ...	...	...	...	...	...	
						7	214		162	5,659	Bhábhar ...	4	3	...	7	...	
						...	505		322	10,104	Suígám ...	...	...	...	...	...	
				1	1	1,980	2,373		1,225	113,422	Radhanpur ...	1,035	945	..	1,539	290	
				7	7	12.326	13,057		10,450	532,187		6,449	5,806	...	9,783	1,321	
																	Northern of Kat
				1	1	2,906	2,619	Dhrángdrá	1,050	100,000	Dhrángdrá, Hálwad	1,536	1,340	...	2,705	112	
				1	1	2,461	2,381	Jinjíwádá..	480	71,809	Jinjíwada, Dasara, Vitthalgarh, Wanod, Bajana	1,314	1,147	...	2,028	287	
				1	1	2,575	3.012	Native States.	208	40,000	Jasdan ..	1,316	1,230	...	2,150	141	
				1	1	2,360	2,108		300	95,000	Limdi ...	1,226	1,128	...	1,984	263	
				1	1	2,381	2,332		362	56,000	Saéla, Sudamda, Múlí	1,134	1,093	...	1,925	100	
				1	1	1,911	1,527		382	50,000	Wakaner, Than	947	952	...	1,384	310	
				1	1	3,087	2,659		171	60,000	Wadwan ...	1,567	1,504	1	2,809	126	
				7	7	17,681	16,638		2,953	472,809		9,040	8,394	1	14,985	1,339	

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Percentage of successful cases excluding those "unknown" from the total. In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	183	1,104	818	1,662	198	112	1,972	50	58	12	8	78	...	89·3	82·8	2,000
13	221	2,627	1,086	3,585	132	69	3,786	73	706	181	11	898	31	96·4	79·5	2,290
...	289	1,654	644	2,035	112	143	2,290	22	214	33	31	278	...	94·7	86·6	1,273
...	287	2,113	2,259	3,942	207	279	4,428	56	188	76	57	318	...	95·0	70·8	2,345
2	158	1,977	924	2,678	100	173	2,951	50	86	24	34	144	...	96·4	78·1	1,522
...	218	1,207	616	1,556	192	107	1,855	32	34	14	21	69	...	89·0	70·8	1,892
...	106	869	800	1,563	52	56	1,671	2	13	2	2	17	...	96·7	86·6	1,686
...	143	492	553	995	29	29	1,053	8	19	7	10	36	...	97·1	73·0	1,081
15	1,605	12,043	7,670	18,016	1,022	968	20,006	293	1,315	349	174	1,838	31	94·6	79·0	1,793
1	66	645	896	1,372	82	76	1,550	9	13	1	6	20	...	93·0	92·8	1,561
1	395	1,094	1,691	2,753	8	24	2,785	...	...	...	...	...	...	99·7	...	2,785
...	92	594	351	863	48	34	945	...	...	...	...	...	...	94·7	...	945
...	146	1,242	842	1,846	81	176	2,103	19	4	8	9	21	...	95·7	33·3	
...	2	53	20	65	6	3	74	1	...	...	...	...	...	91·5	...	2,178
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	
...	98	453	586	976	1	64	1,041	2	...	...	...	...	...	99·8	...	
...	86	299	322	582	3	36	621	...	19	8	2	29	...	99·4	70·3	1,689
...	2	34	44	74	1	3	78	..	...	...	...	...	...	98·8	...	
...	27	132	126	212	11	36	259	1	...	...	...	...	...	95·0	...	
...	80	424	369	665	23	111	799	6	1	...	...	1	...	96·6	100	
...	4	35	16	38	3	10	51	...	...	...	...	...	...	92·6	...	1,188
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	
...	...	4	3	7	...	...	7	..	...	...	...	...	...	100	...	
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	
...	151	587	1,393	1,528	154	298	1,980	...	...		...	...	...	90·7		1,980
2	1,149	5,596	6,659	10,981	421	891	12,293	38	37	17	17	71	...	96·3	68·5	1,760
Division hewad.																
...	59	867	2,009	2,616	167	130	2,913	37	28	2	..	30	...	93·9	93·3	2,906
...	146	856	1,605	2,417	29	31	2,477	16	...	...	..	...	...	98·8	...	2,461
...	255	1,359	1,187	2,456	45	49	2,550	4	24	4	1	29	...	98·2	85·7	2,575
...	107	774	1,580	2,263	62	46	2,371	17	4	1	1	6	...	97·3	80·0	2,360
...	202	675	1,552	2,135	13	80	2,228	1	108	17	29	154	...	99·3	84·7	2,381
...	205	895	1,004	1,400	144	360	1,904	5	6	2	4	12	...	91·3	75·0	1,911
...	135	1,144	1,927	2,877	148	74	3,099	28	8	6	2	16	...	95·1	57·1	3,087
...	1,109	6,570	10,864	16,164	608	770	17,542	108	178	32	37	247	...	96·3	84·7	2,526

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.									
Western Gujaráth Circle—*continued.*	E. R. Butler, M.D., Surgeon-Major.															Western of Kat-
				1	1	2,678	2,287	Dharl ...	317	28,000	Dharol ... / Júdiá ... / Jaliá ... / Diwáni ...	1,016	1,057	...	1,597	245
				1	1	1,635	1,296	Dráphá ...	80	9,500	Dráphá ... / Kondurná ..	833	802	...	1,348	200
				1	1	2,419	2,248	Gondal ...	1,071	103,360	Dhorájí ... / Gondal ... / Wasáwar ...	1,200	1,123	...	1,830	363
				1	1	2,567	2,993 / 257	Morví ...	697	90,000	Morví ... / Tankárá ...	1,292	1,275	...	2,210	357
				1	1	2,221	1,618	Nawánagar	3,460	200,000	Bhánwad ... / Jodhpur ...	1,179	1,035	...	1,916	231
				1	1	2,112	2,228				Khambáliá..	1,123	989	...	1,749	276
				1	1	2,475	2,800				Nawánagar..	1,319	1,146	2	1,556	824
				2	2	4,991	4,433	Rájkot ...	503	43,100	Rájkot ... / Gawáridhar. / Pál ...	1,935	1,875	6	2,958	518
				1	1	2,894	2,797	Porbandar	661	75,000	Porbandar...	1,523	1,371	...	2,272	411
		1	1	10	10	23,392	22,957		6,789	548,960		11,420	10,673	8	17,436	3,425
																Southern of Kat-
				1	1	1,914	2,613	Bábriáwád	25	4,000	Dídan ... / Jafrábád ...	998	871	...	1,635	188
				1	1	2,254	2,505	Bántwá...	70	30,375	Bántwá ...	1,148	1,106	...	1,244	896
				1	1	2,137	790	Bagusrá...	70	11,628	Mánikwáda. / Bilká ... / Bagúsrá ...	1,105	1,006	...	1,838	208
				1	1	2,505	3,300	Jaitpur ...	288	48,830	Jaitpur ...	1,222	1,283	...	2,046	314
				1	1	1,904	2,277	Junágad	3,240	311,550	Junágarh ...	1,015	886	...	1,412	372
				1	1	1,375	2,126				Mangarul ...	758	617	...	1,215	113
				1	1	2,499	2,144				U'ná ...	1,313	1,144	...	2,005	302
				1	1	1,985	1,202				Virâwal ... / Chorwád ...	1,056	929	...	1,527	235
				8	8	16,573	16,957		3,693	406,383		8,615	7,842	...	12,922	2,628

9									10					11	12
vaccine operations.									Re-vaccinations.						
		C.		D.			E.	F.	A.	B.	C.	D.	E.		
		Age.		Result.										Percentage of successful cases, excluding those "unknown" from the total.	Average number of persons vaccinated by each vaccinator.
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.
Division hewad.															
...	231	659	1,414	1,925	119	73	2,117	44	4	1	...	5	...	94·1	80·0	2,078
...	87	433	1,202	1,139	191	308	1,638	3	...	...	...	...	...	85·6	...	1,635
...	130	747	1,576	2,114	123	146	2,383	60	42	29	25	96	...	90·0	59·1	2,419
..	...	1,384	1,183	2,450	...	117	2,567	...	...	...	...	...	...	100	..	2,567
...	67	560	1,654	1,776	300	149	2,225	11	6	1	...	7	..	85·5	85·7	2,221
...	87	686	1,426	1,956	63	93	2,112	...	...	...	...	...	...	96·8	...	2,112
...	83	776	1,689	2,305	113	47	2,465	...	9	1	...	10	...	95·3	90·0	2,475
3	325	2,156	1,654	3,332	332	244	3,908	98	509	661	13	1,183	2	90·9	56·4	2,495
...	211	391	2,503	2,831	52	11	2,894	...	...	...	...	...	...	98·1	..	2,894
3	1,221	7,792	14,301	19,828	1,293	1,188	22,309	216	570	693	38	1,301	2	93·8	45·1	2,339
Division hewad.															
...	46	532	1,337	1,640	148	82	1,870	1	28	16	1	45	...	91·7	63·6	1,914
...	114	756	1,498	2,231	23	...	2,254	...	...	...	...	...	...	98·9	...	2,254
1	64	952	1,159	2,009	89	13	2,111	...	26	...	...	26	...	95·7	100	2,137
...	145	1,086	1,419	2,341	97	67	2,505	...	...	...	...	...	...	96·0	...	2,505
...	117	769	1,132	1,810	8	86	1,904	3	1	1	1	3	...	99·5	50·0	1,904
...	47	745	630	1,248	32	95	1,375	...	...	...	...	...	...	97·5	...	1,375
...	150	980	1,477	2,450	20	2	2,472	15	39	3	...	42	...	99·6	92·8	2,499
...	223	338	1,647	1,953	...	32	1,985	...	...	...	...	...	...	100	.	1,985
1	906	6,158	10,299	15,682	417	377	16,476	19	94	20	2	116	...	97·4	82·4	2,072

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Sex.		Caste.		
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.					Males.	Females.	Christian.	Hindú.	Musalmán.
																Eastern Division
Western Gujaráth Circle—*cld*	E. R. Butler, M.D., Surgeon-Major.			1	1	1,743	2,005	Bhawanagar.			Bhawanagar	927	812	...	1,458	260
				1	1	2,488	2,551				Botád Láthí	1,280	1,208	...	2,241	176
				1	1	2,260	2,523		2,032	264,000	Kundalá	1,135	1,021	...	1,831	210
				1	1	2,493	2,610				Mowá	1,338	1,127	...	2,187	226
				1	1	1,037	2,130				Shehor	548	489	...	957	58
				1	1	2,351	2,399				Talájá	1,125	1,226	...	2,027	224
				1	1	2,358	2,443	Palitana	348	70,000	Pálitáná	1,227	1,127	...	2,144	131
				1	1	2,453	2,355	Wala	140	20,000	Walá	1,273	1,180	...	2,217	116
		1	1	8	8	17,183	19,016		2,520	354,060		8,853	8,190	...	15,062	1,401
Total of Western Gujaráth Circle.		3	3	52	52	108675	108733		30,246	3,142,153		54,603	50,392	28	86,114	12,262
Sindh Circle.	J. Williams, M.D., Surgeon.			1	1	223	1,148	Kárachí Collectorate.	946	5,631	Kárachí	141	80	...	44	177
				2	2	5,454	3,983		18	51,822	Kár chí Town.	3,021	1,415	110	1,049	3,102
				1	1	1,883	1,174		747	66,350	Dádú	1,060	794	...	160	1,680
				1	1	1,059	1,042		925	54,292	Sehwán	609	444	...	86	966
				1	1	618	825		582	18,551	Mánjhándá	344	273	..	63	534
						285	761		830	23,643	Kotrí	146	133	9	61	192
						...	...		2,652	5,681	Kohistán					
		2	1	1	1	1,245	1,279		1,322	37,877	Táttá	655	550	...	63	1,098
				1	1	873	323		1,284	22,646	Mírpur Sákrá	438	412	...	72	731
						1,248	906		642	31,411	Ghorábárí	652	583	...	196	901
				1	1	2,267	683		2,962	21,046	Sháhbandar	1,217	1,013	...	132	1,842
				1	1	1,809	803		543	22,725	Játí	888	731	...	105	1,265
						1,069	869		294	28,471	Belá	549	510	...	88	943
				1	1	948	1,092		333	31,645	Mírpúr Bátorá	494	439	...	72	803
		2	1	11	11	18,981	14,888		14,089	421,791		10,214	7,377	119	2,191	14,234
				2	2	2,796	2,576	Shikárpur Collectorate.	472	73,383	Shikárpur	1,331	974	1	804	1,455
				1	1	2,847	1,537		1,549	66,451	Rohrí	1,481	1,278	...	585	1,919
				1	1	2,244	...		167	20,488	Saidpur	969	791	...	272	1,350
						1,408	1,050		372	46,406	Ghotkí	462	402	...	103	691
				1	1	2,893	1,787		1,721	42,127	Mírpur Mátelo	1,533	943	...	181	2,159
				1	1	2,156	1,456		450	42,043	Obhorá	1,223	901	...	169	1,582
				2	2	3,001	2,926		278	60,223	Sakkar	1,720	1,236	3	810	2,083
				1	1	3,068	1,880		415	48,226	Náoshero	1,781	799	...	431	2,029
		1	1			...	130		192	15,107	Sujáwal	...	...	...	...	...
				1	1	1,737	253		228	35,896	Rátáderá	870	680	...	287	1,179
				1	1	4,920	645		291	79,042	Lárkhána	2,535	1,934	...	686	3,578
				1	1	2,313	1,695		943	73,329	Kambar	1,143	1,023	...	201	1,902
				1	1	2,207	9		343	33,597	Nasirábád	1,233	748	...	263	1,693
						263	1,638		207	31,201	Labdaryá	139	124	...	52	204
				1	1	609	1,349		301	29,023	Tigr	411	123	...	48	435
				1	1	2,466	528		282	33,242	Mehar	1,354	1,042	...	220	2,159
				1	1	2,352	1,624		602	46,443	Kakar	1,593	601	...	423	1,764
		1	1	15	15	37,280	21,083		8,813	776,227		19,778	13,599	4	5,535	26,18

9									10					11	12
vaccine operations.									Re-vaccinations.						
		C.		D.			E.	F.	A.	B.	C.	D.	E.		
		Age.		Result.										Percentage of successful cases, excluding those "unknown" from the total.	Average number of persons vaccinated by each vaccinator.
Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
of Kathewad.																
1	20	733	1,006	1,613	17	109	1,739	...	...	...	4	4	...	98·9	...	1,743
...	71	650	1,838	2,352	21	115	2,488	...	...	...	...	...	...	99·1	...	2,488
...	115	580	1,576	1,809	115	253	2,177	21	48	12	44	104	...	94·0	80·0	2,260
...	52	562	1,903	2,017	167	305	2,489	24	5	10	13	28	...	92·3	33·3	2,493
...	22	274	763	1,030	2	5	1,037	...	...	...	...	...	...	99·8	...	1,037
2	98	798	1,553	1,657	179	515	2,351	...	...	...	...	...	...	90·2	...	2,351
...	79	460	1,894	1,997	42	315	2,354	...	1	...	3	4	...	97·9	100	2,358
...	120	900	1,553	2,416	21	16	2,453		...	...	...	...	...	99·1	...	2,453
3	577	4,957	12,086	14,891	564	1,633	17,088	45	54	22	64	140	...	96·3	71·0	2,148
24	6,567	43,116	61,879	95,562	4,325	5,827	105714	719	2,248	1,133	332	3,713	33	95·6	66·4	2,090
...	...	48	173	179	20	39	238	17	...	1	1	2	...	89·9	...	223
70	105	1,615	2,821	4,030	191	298	4,519	83	665	375	38	1,078	60	95·4	63·9	2,727
...	14	1,262	592	1,792	34	33	1,859	5	23	3	3	29	...	98·1	88·4	1,883
...	1	518	535	999	7	48	1,054	1	2	3	1	6	...	99·3	40·0	1,059
...	20	339	278	576	60	7	643	26	1	...	...	1	...	90·5	100	903
...	17	145	134	272	4	6	282	3	4	1	1	6	...	98·5	80·0	
...	44	403	802	1,193	5	11	1,209	4	18	7	16	41	1	99·5	72·0	1,245
...	47	232	618	803	6	44	853	3	10	8	6	24	1	99·2	55·5	2,121
...	138	239	996	1,118	18	109	1,245	10	10	..	3	13	...	98·4	100	
...	256	647	1,583	1,989	37	214	2,240	10	30	2	5	37	...	98·1	93·7	2,267
...	249	635	984	1,580	35	35	1,650	31	112	46	35	193	3	97·8	70·8	2,878
...	28	592	467	1,013	13	46	1,072	13	7	...	3	10	...	98·7	100	
..	58	433	500	830	14	96	940	7	7	4	4	15	...	98·3	63·6	948
70	977	7,108	10,483	16,374	444	986	17,804	213	889	450	116	1,455	65	97·3	66·3	1,725
...	45	1,483	822	2,164	109	65	2,338	33	364	105	25	494	3	95·2	78·2	1,398
...	255	1,149	1,610	2,566	27	201	2,794	35	52	...	36	88	...	98·7	100	2,847
...	138	646	1,114	1,497	148	165	1,810	50	279	125	87	492	8	91·0	69·0	3,652
...	70	534	330	832	18	29	879	15	358	47	140	545	1	97·8	88·9	
...	136	522	1,954	2,476	30	...	2,506	30	274	119	24	417	...	98·8	69·7	2,893
...	373	1,121	1,003	2,061	15	62	2,138	14	23	5	4	32	...	99·2	82·1	2,156
...	60	2,015	941	2,550	145	387	3,082	126	40	...	6	46	1	94·6	100	1,500
...	120	1,042	1,538	2,483	6	92	2,581	1	460	1	27	488	...	99·7	99·7	3,068
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,737
...	84	856	694	1,538	3	9	1,550	...	159	3	25	187	...	99·8	98·1	
...	205	1,291	3,178	4,207	15	257	4,479	10	233	28	190	451	...	99·6	89·2	4,920
...	63	1,416	750	2,106	13	54	2,173	7	86	...	61	147	...	99·3	100	2,313
...	25	504	1,477	1,918	26	54	1,998	17	190	24	12	226	...	98·6	88·7	2,470
...	7	166	97	261	5	2	268	5	...	...	...	...	...	98·1	...	
...	51	115	419	515	23	11	549	15	71	1	3	75	...	95·7	98·6	3,075
...	17	893	1,503	2,332	25	39	2,396	...	69	...	1	70	...	98·9	100	
...	7	791	1,403	1,898	39	290	2,227	33	110	2	46	158	...	97·9	98·2	2,352
...	1,656	14,544	18,833	31,404	647	1,717	33,768	391	2,768	460	688	3,916	13	97·9	85·7	2,485

1	2	3		4		5		6		7	8			Primary			
												A.		B.			
												Sex.		Caste.			
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindú.	Musalmán.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.										
Sindh Circle—*concluded.*	J. Williams, M.D., Surgeon.	1	1	1	1	2,394	2,620	Haidrábád Collectorate.	414	96,281	Haidrábád ...	1,272	1,104	...	351	1,850	
				1	1	2,054	1,597		...	...	Do. Town	1,120	583	33	692	950	
				1	1	1,669	1,518		989	59.971	Guni ...	769	750	...	137	1,257	
				1	1	1,948	2,001		709	47,922	Bágá ...	949	853	...	148	1,091	
				1	1	2,103	1,891		795	51,593	Baddin ...	1,181	884	...	140	1,765	
				1	1	1,025	1,892		684	30,445	Derá Mohabat.	577	434	...	95	811	
				1	1	1,118	1,087		705	59,746	Aliyár ...	594	496	...	411	583	
						1,564	...		561	22,449	Mirpur Khás...	802	661	...	247	938	
				1	1	1,872	2,156		724	55,707	Sháhdádpur ...	971	802	...	353	1,199	
				1	1	2,831	1,959		531	78,237	Hálá ..	1,515	1,250	...	503	2,141	
				1	1	2,123	2.237		1,390	53,566	Sakrand ...	1,115	966	...	212	1,794	
				1	1	1,350	1,797		704	45.551	Morá ...	723	585	...	185	1,100	
				1	1	1,584	1,535		531	72,711	Náoshero ..	840	732	...	186	1,312	
				1	1	1,722	1,838		315	47,768	Khandiará ...	960	750	...	306	1,378	
		1	1	13	13	25,357	24,128		9,052	721,947		13,388	10,850	33	3,966	18,168	
		1	...	1	1	1,602	1,824	Upper Sindh Frontier.	474	29,946	Jacobabad ...	900	693	1	211	1,360	
				1	1	2,306	735		471	25,232	Kasmor ...	1,263	1,037	...	115	2,134	
				1	1	1,930	661		968	34,807	Thul ...	1,029	888	...	142	1,684	
		1	...	3	3	5,838	3,220		1,913	89,985		3,192	2,618	1	468	5,178	
		1	1	1	1	3,100	2,251	Thar and Párkar.	1,107	36,947	Umarkot ...	1,584	1,338	...	607	1,163	
				1	1	2,752	2,587			27.847	Chachra ...	1,193	963	...	527	1,082	
				1	1	1,548	921		8,508	33,259	Nagar Párkar.	795	716	...	557	349	
				1	1	2,871	1,575			23.039	Mitti ...	1,593	1,229	...	296	1,545	
				1	1	1,227	888			14,524	Dipla ...	668	464	...	180	648	
				1	1	1,479	1,468		3,114	27,189	Kiprá ...	790	657	...	193	1,042	
						1,227	909			17,956	Sánghar ...	645	578	...	42	880	
		1	1	6	6	14,204	10,599		12,729	180,761		7,268	5,945	...	2,402	6,709	
		...	...	2	1	4,331	1,941	Native State.	6,382	110,000	Khairpur ...	2,410	1,918	...	1,130	3,091	
		...	...	...	...	* 954	...	...	...	...	Jodhpur ...	430	276	...	100	409	
		...	...	...	...	† 389	...	...	...	...	Kachi ...	223	158	...	61	320	
Total of Sindh Circle.		6	4	50	49	107334	75,859		52,978	2,300,711		56,903	42,741	157	15,853	74,292	

* The Chachra vaccinator vaccinated these Jodhpuris.

† The Jacobabad vaccinator vaccinated

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Percentage of successful cases, excluding those "unknown" from the total. In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	175	1,060	1,316	2,308	71	36	2,415	39	14	5	...	19	1	97·0	73·1	2,394
3	25	788	915	1,593	63	49	1,705	2	276	60	15	351	...	96·1	82·1	2,054
...	125	474	1,045	1,429	22	86	1,537	18	73	34	43	150	...	98·4	68·2	1,669
...	563	737	1,065	1,668	109	135	1,912	110	86	15	57	158	12	93·8	85·1	1,948
...	160	467	1,598	1,997	7	61	2,065	..	31	6	1	38	...	99·6	83·7	2,103
...	105	423	588	965	18	33	1,016	5	13	...	1	14	...	98·1	100	1,025
...	96	272	818	1,054	...	38	1,092	2	23	1	4	28	...	100	95·8	2,682
...	278	432	1,031	1,373	40	80	1,493	30	67	24	12	103	2	97·1	73·6	
...	221	937	836	1,748	67	15	1,830	57	81	14	4	99	...	96·3	85·2	1,872
...	121	1,129	1,636	2,573	52	140	2,765	...	55	6	13	74	8	98·0	90·1	2,831
...	75	1,281	800	1,984	22	96	2,102	21	29	3	11	43	1	98·9	90·6	2,123
...	23	266	1,042	1,094	121	104	1,319	11	31	3	8	42	...	90·0	91·1	1,350
...	74	766	806	1,511	23	52	1,586	14	10	...	2	12	...	98·5	100	1,584
...	26	1,008	702	1,638	41	62	1,741	31	5	4	3	12	...	97·5	55·5	1,722
3	2,067	10,040	14,198	22,935	656	987	24,578	340	794	175	174	1,143	24	97·6	62·1	1,950
...	21	818	775	1,465	8	125	1,598	5	7	...	2	9	...	99·4	100	1,602
...	51	857	1,443	2,276	11	15	2,302	2	6	...	...	6	...	99·5	100	2,306
...	91	1,010	907	1,847	25	62	1,934	17	10	1	2	13	...	98·1	90·9	1,930
...	163	2,685	3,125	5,588	44	202	5,834	24	23	1	4	28	..	99·2	95·8	2,075
...	1,152	835	2,087	2,719	138	92	2,949	27	85	87	6	178	...	95·1	49·4	3,100
...	547	420	1,736	2,066	83	18	2,167	11	368	208	20	596	...	96·1	63·8	2,752
...	605	456	1,055	1,398	22	102	1,522	11	22	8	7	37	...	98·4	73·3	1,548
...	981	515	2,307	2,570	48	210	2,828	6	28	21	...	49	...	98·1	57·1	2,871
...	304	321	811	1,115	...	17	1,132	...	50	42	3	95	...	100	54·3	1,227
...	212	364	1,083	1,368	13	66	1,447	...	7	25	...	32	...	99·0	21·8	2,706
...	301	411	812	1,082	21	120	1,223	...	4	...	...	4	...	98·0	100	
..	4,102	3,322	9,891	12,318	325	625	13,268	55	564	391	36	991	...	97·4	59·0	2,526
...	107	1,005	3,323	4,066	203	216	4,485	157	...	3	...	3	...	95·2	...	2,165
...	197	109	597	666	68	1	735	29	185	65	3	253	5	90·7	74·0	‡
...	...	111	270	333	1	48	382	1	1	...	7	8	...	99·7	100	‡
73	9,269	38,924	60,720	93,684	2,388	4,782	100854	1,210	5,224	1,545	1,028	7,797	107	97·5	77·1	2,146

these Kachis.

‡ The average is given in Upper Sindh Frontier and Thar and Parkar Districts

1	2	3		4		5		6		7	8	Primary					
												A.		B.			
												Sex.		Caste.			
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.										
Baroda.	G. Edwin Seward, M.D., Surgeon-Major.	1	1	1	23	1,875	29,661	Baroda States.	20,000	112,057	Barodá City ...	1,035	840	4	1,571	246
				1		2,571				287,379	Pádrá ... Kumávisí	1,376	1,193	...	2,284	236
				1		1,619				104,939	Dhabbhoí Sankhedá	865	754	...	1,485	63
				1		1,480				22,588	Sáwalí Wágodiá	776	704	...	1,322	64
				1		1,460				4,255	Senor Koral	789	671	...	1,256	194
				1		774				185,418	Pitlád ... Píploí ...	437	337	...	594	85
				1		1,096						675	421	...	1,020	22
				1		1,097				85,980	Dehagon Atarsumá	595	502	...	982	40
				1		1,117				251,973	Karí ... Samáwru ...	670	447	...	1,049	59
				1		975						549	429	...	971	7
				1		882				295,562	Pattan ... Sidpur ...	452	428	...	726	114
				1		1,251						660	591	...	1,039	176
				1		1,517				79,562	Karalu Vadnagar	971	543	...	1,371	65
				1		867				137,248	Vijápur ...	467	400	...	810	34
				1		919					Nawasarí ...	470	449	...	840	62
				1		1,044					Gandewí ...	559	485	...	858	149
				1		1,294				241,255	Timba Ghala	673	608	...	861	295
				1		1,128					Wada ...	564	564	...	1,117	5
				1		993					Umrelí ...	472	503	...	862	106
				1		991					Damnagar ...	427	383	...	750	30
				1		901				142,856	Corunar ...	413	257	...	648	22
				1		911					Dhárí ...	481	398	...	811	57
				1		1,016				19,153	Ukhámandal ...	539	477	...	813	159
Total of Baroda Circle.		1	1	23	23	27,781	29,661		20,000	2,000,225		14,915	12,384	4	24,040	2,290
Kutch.	Dorabji Hormasji, C.S.M.C.	1	1	11	9	2,476	2,232	Native State of Kutch.	6,500	486,900	Kutch ...	1,260	1,208	1	1,698	768
Aden.	G. W. R. Hay, M.D., Surgeon.	...	...	2	2	1,265	684	Aden ...	12	19,289	Aden ...	927	218	3	48	834
Grand Total.		30	27	377	373	622880	561196		215808	24,362,409		316867	283604	2,643	441465	110679

Details of Column 5.

Total number of persons vaccinated	...	622,880
Deduct persons re-vaccinated ...	...	22,409
Number of persons primarily vaccinated ...		600,471

Details of Pr

Total number of operations
Deduct persons vaccinated

Number of operations in

9									10					11		12
Vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
3	51	1,056	819	1,646	135	94	1,875	...	...	...	...	...	...	92·4	...	1,875
...	49	695	1,874	2,355	110	104	2,569	...	...	1	1	2	...	95·4	...	2,571
...	71	592	1,027	1,422	106	91	1,619	...	...	...	...	...	...	93·0	...	1,619
...	94	643	837	1,321	76	83	1,480	...	...	...	...	...	...	94·5	...	1,480
...	10	507	953	1,424	35	1	1,460	...	...	...	...	...	...	97·6	...	1,460
...	95	334	440	670	77	27	774	...	...	...	...	...	...	89·6	...	774
...	54	298	798	980	62	54	1,096	...	...	...	...	...	...	94·0	...	1,096
...	75	459	638	1,046	13	38	1,097	...	...	...	...	...	...	98·7	...	1,097
...	9	432	685	1,059	49	9	1,117	...	...	...	...	...	...	95·5	...	1,117
...	...	597	381	881	80	17	978	...	...	...	...	...	...	91·6	...	978
...	40	584	296	646	109	125	880	...	2	...	...	2	...	85·5	100	882
...	36	295	956	1,073	144	34	1,251	...	...	...	...	...	...	87·8	...	1,251
...	78	696	818	1,476	14	24	1,514	...	3	...	...	3	...	99·0	100	1,517
...	23	464	403	797	69	1	867	...	...	...	...	...	...	92·0	...	867
4	13	249	670	718	102	99	919	...	...	...	...	...	...	87·5	...	919
14	23	408	636	984	42	18	1,044	...	...	...	...	...	...	95·9	...	1,044
3	122	263	1,018	1,163	57	61	1,281	...	8	...	5	13	...	95·3	10	1,294
6	..	154	974	910	140	78	1,128	...	...	...	...	..	...	86·6	...	1,128
...	7	518	457	813	107	55	975	...	17	1	...	18	...	88·3	94·	993
...	30	572	238	784	8	18	810	...	166	...	15	181	...	98·9	100	991
...	...	310	360	484	...	186	670	...	122	53	56	231	...	100	69·7	901
...	11	259	620	849	...	30	879	...	32	...	...	32	...	100	100	911
...	44	415	601	827	137	52	1,016	...	...	...	...	...	...	85·7	...	1,016
30	935	10,800	16,499	24,328	1,672	1,299	27,299	...	350	55	77	482	...	93·5	86·4	1,207
1	...	484	1,984	2,269	147	52	2,468	...	4	3	1	8	...	93·9	57·1	225
6	254	142	1,003	818	204	123	1,145	...	58	38	24	120	...	80·0	60·4	632
1,117	44,567	226992	373479	545505	28,678	33,459	607642	7,171	12,799	5,949	3,872	22,620	211	94·9	68·2	1,652

mary Vaccinations.

(Col. 9 E.)	...	607,642
...	...	600,471
Excess of persons.		7,171

Details of Re-vaccinations.

Total number of operations, (Col. 10 D)	...	22,620
Deduct persons re-vaccinated	... ...	22,409
Number of operations in excess of persons	..	211

A.—VACCINE DEPARTMENT.

CIVIL.

STATEMENT No. II., showing the monthly number and results of the vaccinations performed, in each circle of superintendence in the Bombay Presidency during the year 1873-74.

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number vaccinated and revaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		Primary vaccination.	Re-vaccination.
Presidency Circle.	April 1873	Whole Circle.	1,436	930	376	171	1,477	85·1	37·7
	May ,,	Do.	741	489	199	87	775	79·3	25·4
	June ,,	Do.	672	510	145	32	687	82·0	56·1
	July ,,	Do.	673	503	145	37	685	80·7	49·2
	August ,,	Do.	898	298	256	387	941	52·2	57·7
	September ,,	Do.	864	502	192	193	887	77·3	63·6
	October ,,	Do.	849	543	102	216	861	90·4	54·4
	November ,,	Do.	1,505	1,035	157	323	1,515	90·9	62·6
	December ,,	Do.	1,745	1,302	198	268	1,768	93·7	61·6
	January 1874	Do.	1,637	1,324	208	146	1,678	92·4	61·3
	February ,,	Do.	1,085	943	99	93	1,135	93·7	56·1
	March ,,	Do.	1,802	1,518	180	140	1,838	96·0	48·9
		Total	13,907	9,897	2,257	2,093	14,247	87·9	53·5
Central Circle.	April 1873	Whole Circle.	11,058	9,607	538	1,048	1,193	95·3	67·1
	May ,,	Do.	11,636	10,122	592	1,036	11,750	95·0	57·6
	June ,,	Do.	9,586	7,859	600	1,264	9,723	93·3	60·0
	July ,,	Do.	8,829	7,286	449	1,202	8,937	94·5	69·5
	August ,,	Do.	7,875	6,851	432	696	7,979	94·4	65·5
	September ,,	Do.	7,709	6,807	410	555	7,772	94·6	56·2
	October ,,	Do.	8,369	7,591	389	540	8,520	95·3	68·0
	November ,,	Do.	9,224	8,587	359	408	9,354	96·4	65·0
	December ,,	Do.	9,970	9,542	300	259	10,101	97·3	66·6
	January 1874	Do.	10,376	9,931	339	228	10,498	97·2	53·9
	February ,,	Do.	10,180	9,770	308	212	10,290	97·3	65·3
	March ,,	Do.	12,528	11,638	327	688	12,653	97·4	61·1
		Total	117,340	105,591	5,043	8,136	118,770	95·8	63·0

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		Primary vaccination.	Re-vaccination.
Southern Circle.	April 1873	Whole Circle.	7,678	6,479	695	620	7,794	91·3	64·8
	May ,,	Do.	6,648	5,658	613	511	6,782	91·5	54·8
	June ,,	Do.	7,519	6,502	651	510	7,663	91·6	61·9
	July ,,	Do.	6,809	5,628	542	783	6,953	91·9	70·0
	August ,,	Do.	6,649	5,530	626	645	6,801	91·1	50·2
	September,,	Do.	6,154	5,229	535	497	6,261	91·7	48·8
	October ,,	Do.	7,179	6,214	505	564	7,283	93·2	61·3
	November ,,	Do.	7,115	5,993	489	715	7,197	93·1	41·6
	December ,,	Do.	8,046	7,357	421	356	8,134	95·6	51·2
	January 1874	Do.	12,243	11,100	734	571	12,405	94·1	78·4
	February ,,	Do.	8,481	7,713	542	388	8,643	93·8	56·8
	March ,,	Do.	8,525	7,571	539	529	8,639	93·3	82·2
		Total ..	93,046	80,974	6,892	6,689	94,555	92·9	61·0
Western Circle.	April 1873	Whole Circle.	6,182	5,631	369	323	6,323	94·0	62·0
	May ,,	Do.	6,071	5,389	390	369	6,148	93·5	56·0
	June ,,	Do.	5,073	4,435	335	368	5,138	93·1	68·2
	July ,,	Do.	4,566	3,901	287	472	4,660	93·2	69·2
	August ,,	Do.	4,555	4,032	346	270	4,648	92·2	73·6
	September,,	Do.	5,497	4,977	443	235	5,655	91·8	90·4
	October ,,	Do.	5,489	4,990	345	276	5,611	93·6	47·3
	November,,	Do.	5,731	5,236	375	255	5,866	96·9	68·7
	December ,,	Do.	5,750	5,271	364	257	5,892	93·5	81·2
	January 1874	Do.	6,675	6,168	337	282	6,787	95·3	66·1
	February ,,	Do.	6,127	5,686	299	248	6,233	95·2	67·2
	March ,,	Do.	7,240	6,730	412	238	7,380	94·5	66·1
		Total ...	68,956	62,446	4,302	3,593	70,341	93·7	67·5
Eastern Gujarath Circle.	April 1873	Whole Circle.	10,116	8,969	522	690	10,211	95·3	58·3
	May ,,	Do.	9,854	8,752	584	600	9,936	94·3	56·0
	June ,,	Do.	7,214	6,473	531	307	7,311	93·7	52·0
	July ,,	Do.	5,560	4,870	508	242	5,620	91·0	66·3
	August ,,	Do.	5,356	4,686	498	207	5,391	90·5	76·3
	September,,	Do.	4,474	3,948	400	193	4,541	91·2	70·2
	October ,,	Do.	4,923	4,427	330	210	4,967	93·5	62·0
	November,,	Do.	5,011	4,576	249	217	5,042	95·3	74·1
	December ,,	Do.	5,877	5,471	232	195	5,898	96·0	79·6
	January 1874	Do.	7,845	7,505	251	133	7,889	97·2	65·7
	February ,,	Do.	7,172	6,845	247	112	7,204	97·4	70·9
	March ,,	Do.	8,698	8,329	241	169	8,739	97·6	80·8
		Total ...	82,100	74,851	4,623	3,275	82,749	94·8	65·9

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown		Primary Vaccination.	Re-vaccination.
Wgurntseaerath Circle.	April 1873	Whole Circle.	10,975	9,978	540	540	11,058	95·5	69·2
	May ,,	Do.	10,840	9,925	437	549	10,911	96·2	77·3
	June ,,	Do.	10,539	9,346	707	583	10,636	94·0	64·6
	July ,,	Do.	8,934	7,911	671	450	9,032	93·9	58·5
	August ,,	Do.	8,801	7,644	710	493	8,847	94·5	51·7
	September,,	Do.	7,781	6,969	406	482	7,857	94·7	82·8
	October ,,	Do.	6,751	6,016	470	332	6,818	94·8	57·6
	November,,	Do.	7,945	7,246	265	471	7,982	96·7	85·7
	December,,	Do.	7,447	6,855	192	439	7,486	97·8	78·5
	January 1874	Do.	7,458	6,788	287	426	7,501	96·4	80·6
	February ,,	Do.	9,740	8,872	373	548	9,793	96·4	68·0
	March ,,	Do.	11,464	10,260	400	846	11,506	96·6	70·0
		Total	108,675	97,810	5,458	6,159	109,427	95·6	66·4
Sindh Circle.	April 1873	Whole Circle.	8,202	7,684	337	294	8,315	97·5	59·4
	May ,,	Do.	8,222	7,592	322	409	8,323	97·2	68·5
	June ,,	Do.	8,450	7,833	401	408	8,642	96·1	80·5
	July ,,	Do.	8,078	7,371	326	502	8,199	97·2	72·5
	August ,,	Do.	7,084	6,487	314	405	7,206	96·3	78·4
	September,,	Do.	9,552	8,532	421	711	9,664	96·6	73·6
	October ,,	Do.	8,230	7,337	341	666	8,344	97·4	75·1
	November,,	Do.	7,940	7,205	286	544	8,035	97·6	77·4
	December,,	Do.	8,875	8,235	272	426	8,933	98·2	76·9
	January 1874	Do.	9,902	9,177	236	582	9,995	98·4	84·3
	February ,,	Do.	11,053	10,398	297	449	11,144	98·4	80·5
	March ,,	Do.	11,746	11,057	380	414	11,851	97·8	83·3
		Total	107,334	98,908	3,933	5,810	108,651	97·5	77·1
Baroda Circle.	April 1873	H. H. the Gáikawár's Territory.	3,134	2,820	172	142	3,134	94·2	
	May ,,		3,033	2,649	205	179	3,033	92·8	
	June ,,		2,537	2,254	168	115	2,537	93·0	
	July ,,		2,323	2,019	175	129	2,323	92·0	
	August ,,		2,019	1,771	170	78	2,019	91·2	
	September,,		2,125	1,822	174	129	2,125	91·2	
	October ,,		1,901	1,698	121	82	1,901	93·3	
	November,,		1,836	1,653	101	82	1,836	94·2	
	December,,		2,076	1,883	114	79	2,076	94·2	
	January 1874		2,338	2,092	101	145	2,338	95·3	
	February ,,		2,189	1,987	102	100	2,189	95·1	
	March ,,		2,270	2,030	124	116	2,270	94·2	
		Total	27,781	24,678	1,727	1,376	27,781	93·5	86

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number vaccinated and revaccinated	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		Primary Vaccination.	Re-vaccination.
Kutch Circle.	April 1873 ...	A portion of the Circle.	226	214	8	4	226	96·3	
	May ,, ...		242	233	8	1	242	96·6	
	June ,, ...		227	215	8	4	227	96·4	
	July ,, ...		124	95	23	6	124	80·5	
	August ,, ...		91	84	6	1	91	93·3	
	September,, ...		47	43	4	...	47	91·4	
	October ,, ...		138	132	5	1	138	96·3	
	November,, ...		209	198	7	4	209	96·5	
	December ,, ...		257	236	15	6	257	94·0	
	January 1874 ...		357	327	21	9	357	93·9	
	February ,, ...		316	270	31	15	316	89·7	
	March ,, ...		242	226	14	2	242	94·1	
		Total ...	2,476	2,273	150	53	2,476	93·9	57·1
Aden.	April 1873 ...	Aden.	Lymph failed.						
	May ,, ...		65	41	21	3	65	66·1	
	June ,, ...		85	68	12	5	85	85·0	
	July ,, ...		105	84	17	4	105	83·1	
	August ,, ...		110	90	16	4	110	84·9	
	September,, ...		90	75	12	3	90	86·2	
	October ,, ...		108	73	19	16	108	79·3	
	November ,, ...		100	69	21	10	100	76·6	
	December ,, ...		117	75	25	17	117	75·0	
	January 1874 ...		142	98	29	15	142	77·1	
	February ,, ...		183	101	40	42	183	71·6	
	March ,, ...		160	102	30	28	160	77·2	
		Total ...	1,265	876	242	147	1,265	80·	60·4
		Grand Total...	622,880	558,304	34,627	37,331	630,262	94·9	68·2

A.—VACCINE DEPARTMENT.

STATEMEMT No. III., showing expenditure of vaccine department in each circle of superintendence in the Bombay Presidency for the year 1873-74.

1	2	3	4	5	6
	Sanctioned	Expended.	Total No. vaccinated and revaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
A.—Paid by Government.	Rs. a. p.	Rs. a. p.			Rs. a. p.
Superintendent General.					
Salary at Rs. 1,150 per mensem ...	13,800 0 0	12,772 0 1			
Head Clerk at Rs. 80 do. ...	960 0 0	960 0 0			
Clerk at Rs. 40 do. ...	480 0 0	480 0 0			
1 Havaldar and 3 Peons, at Rs. 10 and 8 each per mensem	408 0 0	397 12 10			
Travelling Allowances	2,837 0 0	2,633 11 0			
Contingencies	1,420 0 0	1,231 1 0			
Postal Charges	155 0 0	96 3 6			
Total ...	20,060 0 0	18,570 12 5			
Presidency Circle.					
Supdt. at Rs. 350 per mensem ...	4,200 0 0	4,200 0 0			
Native Supdts. at Rs. each do. ...	.....	.....			
Clerk at Rs. per mensem ...	.....	.....			
Havaldar and Peons at Rs. do. ...	.....	.....			
Conveyance Allowances	360 0 0	360 0 0			
Contingencies	25 0 0	9 11 3			
Postal Charges	20 0 0	11 3 8			
Total ...	4,605 0 0	4,580 14 11			
Central Circle.					
Supdt. at Rs. 800 per mensem...	9,600 0 0	7,502 2 0			
5 Native Supdts. at Rs. 75 each do.	5,400 0 0	4,577 5 8			
2 Clerks at Rs. 40 and 25 each do.	780 0 0	714 13 1			
1 Havaldar and 8 Peons at Rs. 10, 8, and 7 each per mensem	816 0 0	779 11 11			
Travelling Allowances	2,500 0 0	2,112 7 0			
Contingencies	369 0 0	236 5 6			
Postal Charges	300 0 0	421 9 0			
Total ...	19,765 0 0	16,344 6 2			
Southern Circle.					
Supdt. at Rs. 600 per mensem...	7,200 0 0	7,011 0 0			
4 Native Supts. at Rs. 75 each do.	3,600 0 0	3,032 11 6			
2 Clerks at Rs. 40 and 25 each do.	780 0 0	770 2 10			
1 Havaldar and 7 Peons at Rs. 10, 8, and 7 each per mensem	648 0 0	669 8 0			
Travelling Allowances	2,500 0 0	1,904 8 0			
Contingencies	292 0 0	293 15 11			
Postal Charges	310 0 0	520 0 0			
Total ...	15,330 0 0	14,201 14 3			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and revaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
ID BY GOVERNMENT—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Rs. 600 per mensem ...	7,200 0 0	7,200 0 0			
Supdts. at Rs. 75 each do.	2,700 0 0	3,458 4 7			
t Rs. 40 and 25 each do.	480 0 0	575 0 0			
r and 8 Peons at Rs. 10, 8, each per mensem	564 0 0	666 8 2			
Allowances	2,500 0 0	2,147 12 0			
es	350 0 0	239 10 6			
ges	200 0 0	235 15 6			
Total ...	13,994 0 0	14,523 2 9			
Rs. 450 per mensem ...	5,400 0 0	5,400 0 0			
updts. at Rs. 75 each do.	4,500 0 0	3,593 0 0			
Rs. 40 and 25 each do.	960 0 0	885 0 0			
and 7 Peons at Rs. 10, 8, each per mensem	1,128 0 0	840 3 1			
Allowances	3,500 0 0	2,046 15 0			
ies	414 0 0	260 2 4			
ges	430 0 0	228 13 6			
Total ...	16,332 0 0	13,254 1 11			
Rs. 100 per mensem ...	1,200 0 0	1,200 0 0			
Supdts. at Rs. 75 each do.	1,800 0 0	2,643 12 0			
at Rs. 40 and 25 each do.	480 0 0	485 5 9			
nators at Rs. 14 each do.	336 0 0	292 9 7			
valdar and 8 Peons at Rs. 10, 8 and 7 each per mensem	564 0 0	752 0 0			
Travelling Allowances	2,100 0 0	2,132 0 0			
Contingencies	287 8 0	193 10 0			
Postal Charges	400 0 0	283 6 6			
Total ...	7,167 8 0	7,982 11 10	4,380	78·6	
SINDH CIRCLE. Supdt. at Rs. 600 per mensem ...	7,200 0 0	7,200 0 0			
6 Native Supdts. at Rs. 100 and 75 each per mensem	3,909 0 0	4,596 10 5			
2 Clerks at Rs. 40 and 25 each do.	480 0 0	517 8 0			
1 Havaldar and 9 Peons at Rs. 10, 8 and 7 each per mensem	648 0 0	742 15 7			
Travelling Allowances	2,500 0 0	2,060 1 0			
Contingencies	339 0 0	326 2 0			
Postal Charges	150 0 0	297 6 6			
Total ...	15,217 0 0	15,740 11 6			
Total paid by Government ...	112,470 8 0	1,05,198 11 9	4,380	78·6	

1	2			3			4	5	6
	Sanctioned.			Expended.			Total No. vaccinated and revaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
B.—Paid by Municipalities.	Rs.	a.	p.	Rs.	a.	p.			
Presidency Circle.									
1 Head Vaccinator at Rs. 45 per mensem.	540	0	0	540	0	0			
5 Vaccinators at Rs. 24 each do.	1,440	0	0	1,438	0	0			
4 Vaccinators at Rs. 18 each per mensem.	864	0	0	860	0	0			
1 Vaccinator at Rs. 14 do.	168	0	0	168	0	0			
11 Peons at Rs. 11 each do.	1,452	0	0	1,452	0	0			
Contingencies including expenses on account of animal vaccination ...	1,637	2	10	1,637	2	10			
Total ...	6,101	2	10	6,095	2	10	13,907		
Central Circle.									
2 Vaccinators at Púna at Rs. 18½ each per mensem.	444	0	0	444	0	0	1,605		
2 Peons at Rs. 6 each do.	144	0	0	144	0	0			
1 Vaccinator at Khed at Rs. 15 per mensem.	180	0	0	161	2	0			
1 Peon do. at Rs. 5 do.	60	0	0	60	0	0	313		
Contingencies per annum	12	0	0	6	8	0			
1 Vaccinator at Náráyangaon and Utur at Rs. 8 per mensem.	96	0	0	96	0	0	497		
1 Vaccinator at Nagar at Rs. 10 per mensem.	120	0	0	110	0	0			
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,120		
Contingencies per annum	.....			0	15	3			
1 Vaccinator at Sholápur at Rs. 15 per mensem.	180	0	0	180	0	0			
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	1,285	93	
Contingencies per annum	.....			10	9	0			
1 Vaccinator at Pandharpur at Rs. 18 per mensem.	216	0	0	216	0	0			
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,403	99·2	0 4
Contingencies per annum	.....			8	3	6			
1 Vaccinator at Barsi at Rs. 15 per mensem.	180	0	0	179	0	0			
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	772	93·3	0 6
Contingencies per annum	6	0	0	7	0	0			
1 *Vaccinator at Baramati at Rs. 12 per mensem.	144	0	0	48	0	0	176	95·0	0 8
1 Peon do. at Rs. 6 do.	72	0	0	24	0	0			
Contingencies per annum	12	0	0	.....					
1 Vaccinator at Sátára at Rs. 15 per mensem.	180	0	0	180	0	0			
1 Peon do. at Rs. 5 do.	60	0	0	60	0	0	992	94·6	0 4
Contingencies per annum	.....			3	6	6			
1 Vaccinator at Walwa at Rs. 15 per mensem.	180	0	0	180	0	0			
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,655	96·1	0 2
Contingencies per annum	18	0	0	.....					
1 Vaccinator at Karhád at Rs. 15 per mensem.	180	0	0	180	0	0			
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,457	97·5	0 3
Contingencies per annum	18	0	0	18	0	0			

* Abolished in July.

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
B—.PAID BY MUNICIPALITIES—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
CENTRAL CIRCLE—*continued.*					
1 Vaccinator at Khanapur† at Rs. 15 per mensem.	180 0 0	120 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	48 0 0	471	79·9	0 8 9
Contingencies per annum	18 0 0	.....			
1 Vaccinator at Malsiras at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	72 0 0	976	91·8	0 5 5
Contingencies per annum	24 0 0	24 0 0			
Total ...	3,492 0 0	3,204 12 3	12,722	94·7	0 5 0
SOUTHERN CIRCLE.					
1 Vaccinator at Belgaum at Rs. 12 per mensem.	144 0 0	144 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	72 0 0	872	92·2	0 4 4
Contingencies per annum	1 9 6	1 9 6			
1 Vaccinator at Gokák at Rs. 15 per mensem.	180 0 0	178 1 0	611	96·0	0 5 3
Contingencies per annum	6 1 9	6 1 9			
1 Vaccinator at Hubli at Rs. 12-9-11 per mensem.	151 7 11	151 7 11	805	93·1	0 3 4
1 Vaccinator at Gadak at Rs 15 per mensem.	180 0 0	180 0 0	881	91·9	0 4 2
1 Vaccinator at Bágalkot at Rs. 18 per mensem.	216 0 0	216 0 0			
1 Peon do. at Rs. 7 do.	84 0 0	84 0 0	1,140	95·1	0 5 1
Contingencies per annum	5 5 4	5 5 4			
1 Vaccinator at Bijapur at Rs. 10 per mensem.	120 0 0	119 0 0	...	.....	...
1 Peon do. at Rs. 5 do.	60 0 0	60 0 0	875	96·2	0 3 11
Contingencies per annum	12 0 0	12 0 0			
1 Vaccinator at Dharwad‡ at Rs. per mensem	.....	.....	40	100	...
Total ...	1,232 8 6	1,229 9 6	5,224	94·1	0 4 3
WESTERN CIRCLE.					
1 Vaccinator at Thána at Rs. 14 per mensem.	168 0 0	168 0 0			
1 Peon do. at Rs. 8 do.	96 0 0	69 0 0	344	88·1	0 15 4
Contingencies per annum	.....	.....			
1 Vaccinator at Panwel and Uran at Rs. 18 per mensem.	216 0 0	216 0 0			
1 Peon do. at Rs. 7 do.	84 0 0	84 0 0	719	92·5	0 7 5
Contingencies per annum	.....	.....			
1 Vaccinator at Násik at Rs. 15 per mensem,	180 0 0	180 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	72 0 0	712	85·5	0 7 1
Contingencies per annum	.....	.....			

† Abolished in November.
‡ Appointed at the close of the year.

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total No. vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
B.—PAID BY MUNICIPALITIES—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
WESTERN CIRCLE-*contd.*											
1 Vaccinator at Dhulia at Rs. 15 per mensem.	180	0	0	180	0	0	867	99·1	0	3	4
Total ...	996	0	0	996	0	0	2,642	92·4	0	6	9
EASTERN GUJARATH CIRCLE.											
1 Vaccinator at Nariad at Rs. 15 per mensem.	180	0	0	173	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	827	92·5	0	5	10
Contingencies per annum	12	0	0	12	0	0					
1 Vaccinator at Broach at Rs. 13 per mensem.	156	0	0	156	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,248	98·2	0	3	9
Contingencies per annum	12	0	0	12	0	0					
1 Vaccinator at Surat at Rs. 13 per mensem.	156	0	0	156	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	2,791	83·6	0	1	11
Contingencies per annum	24	0	0	24	0	0					
Total ...	756	0	0	749	0	0	4,866	88·7	0	3	2
WESTERN GUJARATH CIRCLE.											
2 Vaccinators at Ahmadábád at Rs. 20 each per mensem.	480	0	0	480	0	0					
2 Peons do. at Rs. 7 each do.	168	0	0	168	0	0	4,580	93·2	0	2	5
Contingencies per annum	12	0	0	12	0	0					
1 Vaccinator at Dholka at Rs. 12 per mensem.	144	0	0	144	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	762	97·1	0	4	11
Contingencies per annum	3	0	0	3	0	0					
1 Vaccinator at Dhanduká at Rs. 15 per mensem.	180	0	0	180	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	1,837	90·3	0	2	11
Contingencies per annum	24	0	0	24	0	0					
1 Vaccinator at Veramgaon at Rs. 12 per mensem.	144	0	0	142	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	829	96·2	0	4	11
Contingencies per annum	3	0	0	3	0	0					
Total ...	1,398	0	0	1,396	0	0	8,008	93·2	0	3	0
SINDH CIRCLE.											
2 Vaccinators at Karáchí at Rs. 15 each per mensem.	360	0	0	360	0	0	5,454	89·2	0	1	5
Contingencies per annum	75	0	0	73	8	0					
1 Vaccinator at Shikárpur at Rs. 24 per mensem.	288	0	0	288	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,879	88·7	0	3	6
Contingencies per annum	1	12	0	1	12	0					
1 Vaccinator at Sakkar at Rs. 20 per mensem.	240	0	0	240	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	1,095	97·3	0	7	2
Contingencies per annum	18	0	0	18	0	0					

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each succe-sful case.
B.—Paid by Municipalities—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Sindh Circle—*contd.*					
1 Vaccinator at Haidrabad at Rs. 20 per mensem.	240 0 0	240 0 0			
1 Peon do. at Rs. 7 do.	84 0 0	84 0 0	2,054	93·8	0 2 11
Contingencies per annum	24 0 0	24 0 0			
Total ...	1,486 12 0	1,485 4 0	10,482	90·7	0 2 7
Aden.					
2 Vaccinators at Rs. 18 each per mensem.	432 0 0	378 0 0	1,265	78·3	0 9 2
2 Peons ,, 6 ,, do.	144 0 0	126 0 0			
Total ...	576 0 0	504 0 0	1,265	78·3	0 9 2
Total paid by Municipalities.	16,038 7 4	15,659 12 7	59,116	89·7	0 5 2
C.—Paid from Local Funds.					
Central Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
3 do. ,, 18 each do.	648 0 0	628 7 9			
4 do. ,, 14 ,, do.	672 0 0	630 7 1			
8 Peons ,, 7 ,, do.	672 0 0	670 6 9			
Contingencies per annum	192 0 0	18 1 8			
Poona Zilhá Total ...	2,472 0 0	2,235 7 3	12,498	95·3	0 3 2
1 Vaccinator at Rs 24 per mensem.	288 0 0	288 0 0			
5 do. ,, 18 each do.	1080 0 0	1033 0 0			
5 do. ,, 14 ,, do.	840 0 0	817 15 9			
11 Peons ,, 7 ,, do.	924 0 0	917 0 0			
Contingencies per annum	264 0 0	39 9 6			
Ahmadnagar Zilhá Total ...	3,396 0 0	3,095 9 3	18,912	96·7	0 2 9
1 Vaccinator at Rs 24 per mensem.	288 0 0	287 0 0			
2 do. ,, 18 each do.	432 0 0	431 0 0			
3 do. ,, 14 ,, do.	504 0 0	497 8 0			
6 Peons ,, 7 ,, do.	504 0 0	504 0 0			
Contingencies per annum	144 0 0	16 2 0			
Sholápur Zilhá Total ...	1,872 0 0	1,735 10 0	10,541	93·0	0 3 1

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
C.—PAID FROM LOCAL FUNDS—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
CENTRAL CIRCLE—*contd.*					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	284 8 0			
5 do. ,, 18 each do.	1,080 0 0	1,038 8 0			
6 do. ,, 14 ,, do.	1,008 0 0	986 12 9			
12 Peons ,, 7 ,, do.	1,008 0 0	1,000 8 0			
Contingencies per annum	288 0 0	14 0 3			
Satárá Zilhá Total... ...	3,672 0 0	3,324 5 0	23,210	96·8	0 2 5
1 Vaccinator at Rs. 30 per mensem.	360 0 0	357 0 0			
5 do. ,, 18 each do.	1,080 0 0	1,080 0 0			
5 do. ,, 14 ,, do.	840 0 0	835 0 0			
11 Peons ,, 7 ,, do.	924 0 0	919 6 0			
Contingencies per annum	264 0 0	84 11 11			
Ratnágirí Zilhá Total.	3,468 0 0	3,276 1 11	33,965	94·8	0 1 8
Circle Total ...	14,880 0 0	13,667 1 5	99,126	95·5	0 2 5
SOUTHERN CIRCLE.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	287 0 0			
3 do. ,, 18 each do.	648 0 0	629 12 5			
4 do. ,, 14 ,, do.	672 0 0	661 3 11			
8 Peons ,, 7 ,, do.	672 0 0	672 0 0			
Contingencies per annum	192 0 0	13 12 8			
Belgaum Zilhá Total...	2,472 0 0	2,263 13 0	13,527	91·6	0 2 9
1 Vaccinator at Rs. 24 per mensem.	288 0 0	283 0 0			
5 do. ,, 18 each do.	1,080 0 0	1,062 6 3			
5 do. ,, 14 ,, do.	840 0 0	782 5 4			
11 Peons ,, 7 ,, do.	924 0 0	924 0 0			
Contingencies per annum	264 0 0	18 10 3			
Dhárwád Zilhá Total...	3,396 0 0	3,070 5 10	14,818	91·7	0 3 10
1 Vaccinator at Rs. 24 per mensem.	288 0 0	258 0 0			
3 do. ,, 8 each do.	648 0 0	580 0 0			
5 do. ,, 14 ,, do.	840 0 0	811 7 2			
1 do. ,, 12 per mensem.	60 0 0	51 13 11			
9 Peons ,, 7 each do.	756 0 0	756 0 0			
1 do. ,, 5 per mensem.	25 0 0	21 9 9			
Contingencies per annum	216 0 0	42 13 0			
Kánadá Zilhá Total...	2,833 0 0	2,521 11 10	13,909	91·0	0 3 4

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle—*contd.*					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	283 0 0			
3 do. ,, 18 each do.	648 0 0	600 0 0			
4 do. ,, 14 ,, do.	672 0 0	649 0 0			
8 Peons ,, 7 ,, do.	672 0 0	672 0 0			
Contingencies per annum	192 0 0	29 6 4			
Káládgi Zilhá Total...	2,472 0 0	2,233 6 4	12,093	93·0	0 3 5
Circle Total ...	11,173 0 0	10,089 5 0	54,347	91·6	0 3 5
Western Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
5 do. ,, 18 each do.	1,080 0 0	990 13 5			
5 do. ,, 14 ,, do.	840 0 0	743 10 5			
11 Peons ,, 7 ,, do.	924 0 0	916 8 6			
Contingencies per annum	264 0 0	69 4 4			
Tháná Zilhá Total...	3,396 0 0	3,008 4 8	12,464	91·1	0 4 3
1 Vaccinator at Rs. 24 per mensem.	288 0 0	248 0 0			
2 do. ,, 18 each do.	432 0 0	426 2 0			
2 do. ,, 14 ,, do.	336 0 0	336 0 0			
5 Peons ,, 7 ,, do.	420 0 0	420 0 0			
Contingencies per annum	120 0 0	46 15 8			
Kolábá Zilhá Total...	1,596 0 0	1,477 1 8	7,875	92·8	0 3 4
1 Vaccinator at Rs. 30 per mensem.	360 0 0	313 2 3			
4 do. ,, 18 each do.	864 0 0	811 8 0			
5 do. ,, 14 ,, do.	840 0 0	811 4 10			
10 Peons ,, 7 ,, do.	840 0 0	833 0 0			
Contingencies per annum	240 0 0	30 12 6			
Násik Zilhá Total...	3,144 0 0	2,799 11 7	14,532	91·0	0 3 6
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
7 do. ,, 18 each do.	1,512 0 0	1,444 15 0			
8 do. ,, 14 ,, do.	1,344 0 0	1,278 13 5			
16 Peons ,, 7 ,, do.	1,344 0 0	1,313 15 4			
Contingencies per annum	384 0 0	76 13 6			
Khandesh Zilha Total...	4,872 0 0	4,402 9 3	25,427	95·6	0 2 11
Circle Total ...	13,008 0 0	11,687 11 2	60,298	93·3	0 3 5

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Eastern Gujarát Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
3 do. ,, 18 each do.	648 0 0	579 12 0			
4 do. ,, 14 ,, do.	672 0 0	661 4 8			
8 Peons ,, 7 ,, do.	672 0 0	652 6 2			
Contingencies per annum	192 0 0	114 7 5			
Kheda Zilhá Total...	2,472 0 0	2,295 14 3	17,452	92·0	0 2 4
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
2 do. ,, 18 each do.	432 0 0	431 15 0			
2 do. ,, 14 ,, do.	336 0 0	333 0 0			
5 Peons ,, 7 ,, do.	420 0 0	419 12 0			
Contingencies per annum	120 0 0	41 0 2			
Panch Maháls Total ...	1,596 0 0	1,513 11 2	7,998	96·3	0 3 1
1 Vaccinator at Rs. 24 per mensem.	288 0 0	284 14 0			
1 do. ,, 18 do.	216 0 0	216 0 0			
2 do. ,, 14 each do.	336 0 0	331 0 0			
4 Peons ,, 7 ,, do.	336 0 0	336 0 0			
Contingencies per annum	96 0 0	57 4 8			
Broach Zilhá Total ...	1,272 0 0	1,225 2 8	7,884	96·6	0 2 7
1 Vaccinator at Rs. 24 per mensem.	288 0 0	285 14 0			
3 do. ,, 18 each do	648 0 0	672 15 0			
4 do. ,, 14 ,, do.	672 0 0	654 10 6			
8 Peons ,, 7 ,, do.	672 0 0	662 1 10			
Contingencies per annum	192 0 0	94 2 2			
Surat Zilhá Total ...	2,472 0 0	2,369 11 6	14,915	94·2	0 2 9
Circle Total ...	7,812 0 0	7,404 7 7	48,249	94·4	0 2 8
Western Gujarát Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	234 0 0			
3 do. ,, 18 each do.	648 0 0	634 0 0			
3 do. ,, 14 ,, do.	504 0 0	480 0 0			
7 Peons ,, 7 ,, do.	588 0 0	341 0 0			
Contingencies per annum	168 0 0	76 1 11			
Ahmadábád Zilhá Total ...	2,196 0 0	1,765 1 11	13,512	93·4	0 2 4
Circle Total ...	2,196 0 0	1,765 1 11	13,512	93·4	0 2 4

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
1 Vaccinator at Rs. 24 per mensem.	288 0 0	204 0 0			
4 do. ,, 18 each do.	864 0 0	611 10 4			
4 do. ,, 14 ,, do.	672 0 0	611 12 9			
9 Peons ,, 7 ,, do.	756 0 0	610 2 8			
Superintendent's Allowance	510 10 0	510 10 0			
Contingencies per annum	756 0 0	521 11 3			
Karáchí Zilhá Total ...	3,846 10 0	3,069 15 0	13,527	97·4	0 3 10
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
6 do. ,, 18 each do.	1,296 0 0	1,282 0 0			
6 do. ,, 14 ,, do.	1,008 0 0	819 2 2			
13 Peons ,, 7 ,, do.	1,092 0 0	977 0 0			
Superintendent's Allowance	740 12 0	740 12 0			
Contingencies per annum	1,092 0 0	788 2 10			
Shikárpur Zilhá Total ...	5,516 12 0	4,895 1 0	34,306	97·3	0 2 5
2 Vaccinators at Rs. 24 and 30 per mensem.	648 0 0	588 12 9			
5 do. ,, 18 each do.	1,080 0 0	1,035 0 0			
5 do. ,, 14 ,, do.	840 0 0	805 0 0			
12 Peons ,, 7 ,, do.	1,008 0 0	886 8 5			
Superintendent's Allowance	548 10 0	548 10 0			
Contingencies per annum	288 0 0	108 14 9			
Haidrábád Zilhá Total ...	4,412 10 0	3,972 13 11	23,303	96·7	0 2 10
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
2 do. ,, 18 each do.	432 0 0	432 0 0			
3 do. ,, 14 ,, do.	504 0 0	425 3 10			
6 Peons ,, 7 ,, do.	504 0 0	466 11 11			
Contingencies per annum	144 0 0	89 6 4			
Thar and Párkar Total ...	1,872 0 0	1,701 6 1	15,158	94·2	0 1 11
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
1 do. ,, 18 do.	216 0 0	.....			
1 do. ,, 14 do.	168 0 0	336 0 0			
3 Peons ,, 7 do.	252 0 0	250 6 9			
Contingencies per annum	72 0 0	30 10 8			
Upper Sindh Frontier Total ...	996 0 0	905 1 5	6,227	99·2	0 2 5
Circle Total ...	16,644 0 0	14,544 5 5	92,521	96·8	0 2 8
Total paid from Local Funds ...	65,713 0 0	59,158 0 6	368,053	94·7	0 2 10

Sindh Circle

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
D.—Paid by Native Chiefs or Landlords.	Rs. a. p.	Rs. a. p.			Rs. a. p.
Central Circle.					
1 Vaccinator by Akalkot State at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon at Rs. 6 do.	72 0 0	72 0 0	1,414	92·2	0 3 7
Contingencies per annum	12 0 0	7 15 0			
1 Vaccinator paid by Bhor State at Rs. 21 per mensem.	252 0 0	250 0 0	1,511	98·5	0 3 4
1 Peon do. at Rs. 4½ do.	54 0 0	54 0 0			
1 Vaccinator by Jat State at Rs. 12 per mensem.	144 0 0	142 0 0			
1 Peon do. at Rs. 1 do.	12 0 0	12 0 0	1,098	97·8	0 2 4
Contingencies per annum	6 0 0	6 0 0			
1 Vaccinator by Phaltan State at Rs. 10 and 15 per mensem.	145 0 0	145 0 0	1,082	92·8	0 3 6
1 Peon do. at Rs. 4 do.	48 0 0	48 0 0			
1 Vaccinator paid by Atpadi State at Rs. per mensem.	Unknown.	Unknown.			
1 Peon do. at Rs. do.	Do.	Do.	387	97·9	Unknown.
Contingencies per annum	Do.	Do.			
Circle Total ...	925 0 0	916 15 0	5,492	95·7	0 3 0
Southern Circle.					
1 Vaccinator by Sawántwadi State at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	72 0 0	6,257	90·0	0 0 10
Extra Peons (2) do. at Rs. 2 each do.	48 0 0	48 0 0			
3 Vaccinators by Sangli State at Rs. 22 and 12 per mensem.	552 0 0	362 4 6			
3 Peons do. at Rs. 7 each. do.	252 0 0	85 6 9	1,181	91·6	0 7 11
Contingencies per annum	20 14 3	20 14 13			
3 Vaccinators by Miraj State at Rs. 10,15, and 8 per mensem.	438 0 0	424 11 4			
2 Peons at Rs. 6 and 5-14-0 do.	142 8 0	142 8 0	2,123	97·7	0 4 5
Contingencies per annum	2 8 0	2 8 0			
2 Vaccinators by Kurándwad State at Rs. 18 per mensem.	216 0 0	216 0 0			
1 Peon do. at Rs. 8 do.	96 0 0	96 0 0	2,200	95·3	0 3 0
Contingencies per annum	75 0 0	75 0 0			
1 Vaccinator by Mudhol State at Rs. 18 per mensem	216 0 0	173 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	72 0 0	1,208	45·6	0 7 4
1 Vaccinator by Ramdrug State at Rs. 12-1-11 per mensem.	145 7 0	145 7 0			
1 Peon do. at Rs. 4 do.	48 0 0	35 0 0	859	92·8	0 5 9
Contingencies per annum	96 0 0	96 0 0			
2 Vaccinators by Jamkhandi State at Rs. 20 each per mensem.	240 0 0	240 0 0			
1 Peon do. at Rs. 10	120 0 0	120 0 0	1,691	88·0	0 4 8
1 Vaccinator by Sávanur State at Rs. 15 per mensem.	180 0 0	133 7 6			
1 Peon do. at Rs. 7	84 0 0	84 0 0	389	85·3	0 10 10

1	2	3	4	5	6
	Sanctioned.	Expended.	Total No. vaccinated and revaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
D.—Paid by Native Chiefs or Landlords—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle—*contd.*					
1 Native Superintendent in Kholapur State at Rs. 75 per mensem.	900 0 0	770 0 0			
1 Peon do. Rs. 6 do.	72 0 0	57 0 0			
Contingencies per annum	24 0 0	20 0 0			
1 Vaccinator by Kholapur State at Rs. 25 per mensem.	300 0 0	258 0 0			
1 Do. ,, 22 do.	264 0 0	240 0 0			
1 Do. ,, 18 do.	216 0 0	198 0 0			
4 Do. ,, 16 each per mensem.	768 0 0	633 15 7			
1 Do. ,, 15 ,, do.	180 0 0	176 0 0			
3 Do. ,, 14 ,, do.	504 0 0	494 0 0			
11 Peons ,, 4-13-1 ,, do.	583 0 0	583 0 0			
Contingencies per annum . .	110 15 6	110 15 6			
Circle Total ...	7,218 4 9	6,365 2 5	33,475	92·6	0 3 5
Western Circle.					
1 Vaccinator by Jawár State at Rs. 16 per mensem.	192 0 0	192 0 0	2,044	97·1	0 1 6
1 Vaccinator by Janjira State at Rs. 20 per mensem.	240 0 0	240 0 0	2,982	94·2	0 1 4
1 Vaccinator by Penth State at Rs. 17 8 0 per mensem.	210 0 0	157 8 0	990	97·2	0 3 8
1 Peon do. at Rs. 6 do.	72 0 0	54 0 0			
Circle Total ...	714 0 0	643 8 0	6,016	95·7	0 1 10
Eastern Gujarát Circle.					
2 Vaccinators by H. H. the Maharája of Idar at Rs. 20 each per mensem.	480 0 0	480 0 0			
2 Peons do. at Rs. 5 and 6 do.	132 0 0	132 0 0	3,577	93·5	0 3 1
Contingencies per annum	24 0 0	24 0 0			
3 Vaccinators by Máhi Kánthá Thákurs at Rs. 20 each per mensem.	720 0 0	539 5 8	4,107	88·3	0 2 7
Contingencies per annum	36 0 0	33 0 0			
2 Vaccinators by Lunáwádá at Rs. 18 each per mensem.	432 0 0	422 0 0	2,191	96·1	0 4 3
2 Peons do. Rs. 5¼ each do.	126 0 0	126 0 0			
Contingencies at Rs. 2-10-0 each per annum.	5 4 0	5 4 0			
1 Vaccinator by Rájpiplá at Rs 18 5-3 per mensem.	219 15 0	219 15 0			
1 do. ,, 15-11-4 do.	188 8 0	188 8 0	3,100	95·7	0 2 9
2 Peons at Rs. 4-5-10 each do.	104 12 0	104 12 0			
Contingencies per annum.	5 4 0	5 4 0			
1 Vaccinator by Bálásinur at Rs. 13 per mensem.	156 0 0	156 0 0			
1 Peon at Rs. 3-8-0 do.	42 0 0	42 0 0	1,091	93·2	0 3 3
Contingencies per annu .. .	2 10 0	2 10 0			

1	2			3			4	5	6
	Sanctioned.			Expended.			Total No. vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
D.—Paid by Native Chiefs or Landlords—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs. a. p.
Eastern Gujarát'h Circle—*contd.*									
1 Vaccinnator by Deogad Báriá at Rs. 20 per mensem.	240	0	0	240	0	0			
1 do. ,, 18 do.	216	0	0	216	0	0	3,822	97·6	0 2 6
2 Peons at Rs. 5-4-0 each do.	126	0	0	126	0	0			
Contingencies per annum	5	4	0	5	4	0			
1 Vaccinator by Sunth and Kadana at Rs. 18 per mensem.	216	0	0	194	0	0			
1 Peon at Rs. 5-4-0 do.	63	0	0	63	0	0	1,734	93·6	0 2 7
Contingencies per annum	2	10	0	2	10	0			
1 Vaccinator by Chota Udaipur at Rs. 18 per mensem.	216	0	0	213	0	0			
Do. Peon ,, 3-8-0 do.	42	0	0	42	0	0	549	86·5	0 8 7
Contingencies per annum	2	10	0	2	10	0			
1 Vaccinator by Sankheda Mewas at Rs. 18 per mensem.	216	0	0	216	0	0			
Do. Peon at Rs. 5-4-0 do.	63	0	0	63	0	0	888	95·4	0 5 7
Contingencies per annum	2	10	0	2	10	0			
1 Vaccinator by Cambay at Rs. 20 per mensem.	240	0	0	235	0	0			
1 Peon at Rs. 4-8-0 do.	54	0	0	54	0	0	2,341	95·9	0 2 0
1 Vaccinator by Dharmpur at Rs. 15 per mensem.	180	0	0	180	0	0			
1 Peon at Rs. 6 do.	72	0	0	72	0	0	2,725	7·8	0 1 8
Contingencies per annum	18	0	0	18	0	0			
1 Vaccinator by Bánsdá at Rs. 15 per mensem.	180	0	0	180	0	0			
1 Peon at Rs. 6 do.	72	0	0	72	0	0	2,860	96·4	0 1 6
Contingencies per annum	18	0	0	6	0	0			
Circle Total ...	4,919	7	0	4,683	12	0	28,985	94·5	0 2 9
Western Gujarát'h Circle.									
2 Vaccinators by Pálanpur at Rs. 22 and 15 per mensem.	444	0	0	.....					
2 Peons do. at Rs. 5 each do.	120	0	0	.....					
Contingencies per annum	12	0	0	.....					
1 Vaccinator by Radhanpur at Rs. 18 per mensem.	216	0	0	.....					
1 Peon do. at Rs. 5 do.	60	0	0	.....					
1 Vaccinator by Thákurs of Wáw, Tharád, Morwada, Sántalpur, Charchat, Wárye, Deodar, Bhábhar, Tehrwádá and Suígám at Rs. 22 per mensem.	264	0	0	.....					
1 Peon do. at Rs. 5 do.	60	0	0	.....					
2 Vaccinator by Fine fund of the Political Superintendency of Palanpur at Rs. 20 per mensem.	456	0	0	.....					
2 Peons at Rs. 6 each do.	144	0	0	.....					
Palanpur States Total...	1,776	0	0	2,046	8	0	10,765	96·4	0 3 4

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and revaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
D.—Paid by Native Chiefs or Landlords—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Western Gujerá'th Circle—*contd.*					
Paid by Native Chiefs of Káthewád.					
1 Vaccinator at Rs. 30 per mensem.	360 0 0	355 0 0			
1 Peon at Rs. 7 do.	84 0 0	52 0 0			
2 Vaccinators at Rs. 25 each per mensem.	600 0 0	550 0 0			
2 Peons at Rs. 7 each do.	168 0 0	168 0 0			
1 Vaccinator at Rs. 25 per mensem.	300 0 0	300 0 0			
1 Peon at Rs. 7 do.	84 0 0	84 0 0			
1 Vaccinator at Rs. 20 per mensem.	240 0 0	220 0 0			
1 Peon at Rs. 7 do.	84 0 0	84 0 0			
5 Vaccinators at Rs. 18 each do.	1,080 0 0	1,065 0 0			
5 Peons at Rs. 7 ,, do.	420 0 0	420 0 0			
7 Vaccinators at Rs. 15 ,, do.	1,260 0 0	1,245 0 0			
7 Peons at Rs. 7 ,, do.	588 0 0	567 0 0			
15 Vaccinators at Rs. 14 each per mensem.	2,520 0 0	2,439 12 4			
15 Peons at Rs. 7 each do.	1,260 0 0	1,245 0 0			
2 Candidate Vaccinators at Rs. 4 each do.	96 0 0	79 4 9			
Chiefs' allowance to Superintendent at Rs. 50 per mensem.	600 0 0	600 0 0			
4 Agents at Rs. 5 each ... do.	240 0 0	240 0 0			
Bhattá to Vaccinators	990 0 0	960 0 0			
Contingencies	557 3 6	557 3 6			
Káthewád States Total...	11,531 3 6	11,231 4 7	72,010	95·8	0 2 8
Circle Total...	13,307 3 6	13,277 12 7	82,775	95·9	0 2 9
Sindh Circle.					
2 Vaccinators by Mír Alí Murád of Khairpur at Rs. 25 each per mensem	600 0 0	600 0 0	4,331	95·1	0 3 0
Peons do. at Rs. 7 each do	168 0 0	168 0 0			
Circle Total	768 0 0	768 0 0	4,331	95·1	0 3 0
Baroda' Circle.					
Paid by H. H. the Gáikawad of Barodá					
1 Native Inspector at Rs. 27 per mensem.	324 0 0	324 0 0			
Travelling allowance to do. at Rs. 27 per mensem.	324 0 0	324 0 0			
Bhattá to do. for 6 months at Rs. 15 per mensem.	90 0 0	90 0 0			
1 Vaccinator at Rs. 25 per mensem.	300 0 0	300 0 0			
6 Do. at ,, 18 each do.	1,296 0 0	1,296 0 0			
11 Do. at ,, 15 each do.	1,980 0 0	1,980 0 0			
Contingent allowance to the Inspector and Vaccinators at Rs. 10 per mensem.	120 0 0	120 0 0			
1 English and Vernacular Clerk at Rs. 30 per mensem.	360 0 0	360 0 0			
2 Peons at Rs. 9 each do.	216 0 0	216 0 0			
18 Do. ,, 7 ,, do.	1,512 0 0	1,512 0 0			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and revaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
D.—Paid by Native Chiefs or Landlords—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Baroda Circle—*contd.*					
For Káthewád Districts.					
1 Vaccinator at Rs 35-10-0 per mensem.	427 8 0	427 8 0			
1 Do. ,, 22-0-0 do.	264 0 0	264 0 0			
3 Do. ,, 20-0-0 each do.	720 0 0	720 0 0			
5 Peons ,, 8-0-0 ,, do.	480 0 0	480 0 0			
Total Barodá Rs. ..	8,413 8 0	8,413 8 0			
Equivalent to British Rupees...	7,085 1 0	7,085 1 0			
Circle Total...	7,085 1 0	7,085 1 0	27,781	93·4	0 4 7
Kutch Circle.					
Paid by H. H. the Rao of Kutch—					
1 Assistant Superintendent at Rs. 10-14-2 per mensem.	130 10 0	130 10 0			
Travelling bhattá to do. at Rs. 7-14-8 per mensem.	95 0 0	78 10 0			
Pony expense to do. at Rs. 11-14-0 do.	142 8 0	115 5 11			
1 Peon at Rs. 3-10-0 per mensem.	43 8 0	39 14 0			
Travelling bhattá to do. at Rs. 5-15-0 per mensem.	71 4 0	59 1 8			
1 Vaccinator at Bhuj at Rs. 3-10-0 per mensem.	21 12 0	21 12 0			
1 Do. at Mándvi at Rs. 7-4-2 do.	43 9 0	29 0 8			
1 Do. at Mundhrá ,, 12-1-6 do.	145 2 0	145 2 0			
3 Do. at Rs. 7-4-2 each do.	261 6 0	227 14 5			
Do. Travelling bhattá at Rs. 7-14-8 per mensem.	285 0 0	160 11 0			
Do. Pony expense at Rs. 11-14-0 per mensem.	427 8 0	232 7 3			
6 Peons at Rs. 3-10-0 each per mensem.	130 8 0	94 4 0			
Do. do. Travelling bhatta at Rs. 5-15-0 per mensem.	213 12 0	117 12 11			
Total ...	2,011 7 0	1,452 9 10	1,754	93·5	0 14 7
Paid by Bháyáds.					
2 Vaccinators at Rs. 10 each per mensem.	240 0 0	240 0 0			
1 Do. at Rs. 7-14-8 do.	95 0 0	95 0 0			
Do. Bhattá at Rs. 7-14-8 do.	95 0 0	95 0 0			
Do. Pony expense at Rs. 3-15-4 do.	47 8 0	47 8 0			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
D—Paid by Native Chiefs or Landlords—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Kutch Circle—*contd.*					
1 Peon at Rs. 2-10-2 do.	31 10 0	31 10 0			
Do. Bhatta at Rs. 3-15-4 do.	47 8 0	47 8 0			
1 Vaccinator at Rs. 10 per mensem.	120 0 0	120 0 0			
1 Peon at Rs. 4 do.	48 0 0	48 0 0			
1 Vaccinator at Rs. 7-14-8 do.	95 0 0	95 0 0			
Do. Bhattá at Rs. 3-15-4 do.	47 8 0	47 8 0			
Total ...	867 2 0	867 2 0	722	94·4	1 4 4
Circle Total ...	2,878 9 0	2,319 11 10	2,476	93·8	1 0 3
Total paid by Native Chiefs or Landlords ...	37,815 9 3	36,059 15 6	191,331	94·7	0 3 3
Grand Total ...	232,037 8 7	216,076 8 4	622,880	94·1	0 6 2

A.—VACCINE DEPARTMENT.

STATEMENT No. IV., showing Result of the Year 1873-74, *as compared with those of each of the previous five years in the Bombay Presidency.*

1	2	3	4	5				6	7	8	9
				No. of Vaccinators.							
Year.	Total number of persons vaccinated and re-vaccinated.	Number successful.	Ratio per cent. successful, excluding those "unknown" from the total.	A. Paid by state.	B. Paid from other sources.	C. Total.	D. No. previously employed as inoculators or private practitioners.	Cost of whole vaccine establishment.	Cost of travelling allowances and contingencies.	Total cost.	Cost of each successful case.
								Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
1868	393,865	370,216	97·3	134	126	260	.....	*	*	1,11,524 0 0	0 4 2
1869-70	424,774	397,622	96·7	134	141	275	.....	1,18,389 0 0	17,812 0 0	1,36,201 0 0	0 5 6
1870-71	491,605	447,048	95·0	134	192	326	.....	1,42,536 0 0	27,515 0 0	1,70,051 0 0	0 6 0
1871-72	526,402	484,095	94·8	3	370	373	.....	1,56,331 0 0	28,128 5 2	1,84,459 5 2	0 6 1
1872-73	561,196	504,263	93·9	2	371	373	.....	1,77,848 4 0	32,946 12 11	2,10,795 0 11	0 6 8
1873-74	622,880	558,304	94·1	2	376	378	.....	1,85,607 12 3	30,468 12 1	2,16,076 8 4	0 6 2

* These columns cannot be filled up correctly.

B.

DISPENSARY VACCINATION.

STATEMENT No. V., showing particulars of vaccination in the dispensaries in

1	2	3		4		5		6	7	8	PRIMARY				
											A.		B.		
											Sex.		Caste.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindú.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.								
Central Circle.	P. S. Turnbull, M.D., Surgeon Major—Acting, W. R. Gordon, M.B., Surgeon.	...	...	...	...	1,147	811	Púná. Púná Town	90,436	Dispensary...	624	514	8	958	53
		...	...	...	...	290	158	Junar ...	10,298	Do. ...	135	155	...	259	31
		...	...	...	...	85	78	Indâpur ...	77,40	Do. ...	48	37	2	60	17
		...	...	...	...	142	39	Sáswad ...	6,432	Do. ...	80	62	...	139	3
		...	...	...	...	186	65	Sirûr ...	5,049	Do. ...	99	87	4	120	34
		...	...	...	...	56	...	Jejurí ...	3,102	Do. ...	29	27	...	56	...
		...	...	...	...	...	...	Báramati ..	4,975	Do. ...	...	...	...	...	...
		...	...	...	...	1,906	1,151		128,032		1,015	882	14	1,592	138
		...	...	...	...	72	78	Ahmadnagar. Ahmadnagar	32,841	Dispensary.	46	26	1	52	13
		...	...	...	...	73	10	Sangamner	9,978	Do. ...	32	41	...	61	11
		...	...	...	...	145	88		42,819		78	67	1	113	24
		...	...	...	...	572	514	Sholápur. Sholápur Town.	53,403	Dispensary.	283	266	2	408	...
		...	...	...	...	113	108	Pandharpur.	16,275	Do. ...	56	57	...	109	4
		...	...	...	...	80	44	Bársi ...	18,560	Do. ...	34	46	...	74	6
		...	...	...	...	231	273	Akalkot ...	8,372	Do. ...	119	112	...	165	66
		...	...	...	...	996	939		96,610		492	481	2	756	208
		...	...	...	...	246	255	Satara. Karhád ...	11,410	Dispesnary...	127	119	...	221	25
		...	...	...	...	101	542	Wái... ...	11,062	Do. ...	60	41	....	100	...
		...	...	...	...	156	164	Islámpur ...	8,390	Do. ...	83	73	1	146	9
		...	...	...	...	36	229	Mahableshwar.	4,006	Do. ...	13	22	8	18	8
		...	...	...	...	21	...	Punsáwali ...	2,456	Do. ...	11	10	...	21	...
		...	...	...	...	27	...	Pátan ...	3,033	Do. ...	18	9	21	6	...
		...	...	...	...	587	1,190		40,357		312	274	30	512	42
		...	...	...	...	339	310	Ratnagiri. Dápulí ...	8,972	Dispensary...	185	154	4	279	56
		...	...	...	...	228	173	Vingurlá...	10,618	Do. ...	133	95	17	210	1
		...	...	...	...	567	483		19,590		318	249	21	489	57
Total ...		...	...	...	...	4,201	3,851		327,408		2,215	1,953	68	3,462	469

VACCINATION.

each circle of superintendence in the Bombay Presidency, during the Year 1873-74.

9									10					11		12
VACCINE OPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES, EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
3	116	516	622	767	86	293	1,146	8	2	3	4	9	...	89·9	40·0	1,147
..	..	65	225	249	30	11	290	...	...	...	...	...	...	89·2	...	290
...	6	41	44	78	7	...	85	...	...	...	...	...	...	91·7	...	85
...	...	61	81	119	18	12	149	7	...	...	...	...	...	86·8	..	142
...	28	74	112	181	17	1	199	13	...	...	...	...	...	94·4	...	186
...	...	11	45	31	16	9	56	...	...	...	...	...	...	66·0	...	56
...	...	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	...
3	150	768	1,129	1,425	174	326	1,92	28	2	3	4	9	...	89·1	40·0	318
...	6	37	35	72	...	...	7	...	...	...	...	...	...	100	...	72
...	1	43	30	68	11	2	81	8	...	...	...	...	...	86·0	...	73
..	7	80	65	140	11	2	153	8	...	...	...	...	...	92·7	...	72
1	6	289	260	524	32	8	564	15	13	10	...	23	...	94·2	56·5	572
...	...	57	56	110	...	3	113	...	...	...	...	...	...	100	...	113
...	...	50	30	65	13	2	80	...	...	...	...	...	...	83·3	...	80
...	...	157	74	213	23	18	254	23	...	...	...	...	...	90·3	...	231
1	6	553	420	912	68	31	1,011	38	13	10	...	23	...	93·0	56·5	249
...	...	128	118	231	14	2	247	1	...	...	...	...	...	94·7	...	246
...	1	45	56	101	...	...	101	...	...	...	...	...	...	100	...	101
...	...	70	86	129	14	15	158	2	...	...	...	...	...	90·2	...	156
...	1	21	14	22	14	2	38	3	...	1	...	1	...	61·1	.	36
...	...	...	21	21	...	...	21	...	...	...	...	...	...	100	...	21
...	...	4	23	27	...	...	27	...	...	...	...	...	...	100	...	27
...	2	268	318	531	42	19	592	6	...	1	...	1	...	92·6	...	98
...	...	119	220	331	29	3	363	24	...	...	...	...	...	91·9	...	339
...	...	147	81	221	4	3	228	...	...	...	...	...	...	98·2	...	228
..	...	266	301	552	33	6	591	24	...	...	...	...	...	94·3	...	283
4	165	1,935	2,233	3,560	328	384	4,272	104	15	14	4	33	...	91·6	51·7	260

1	2	3		4		5		6	7	8	PRIMARY				
											A.		B.		
											Sex.		Caste.		
Circle of medical superintendence	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindú.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.								
Southern Circle.	J. Raby, Surgeon.	...	...	...	...	....	...	Belgaum — Belgaum	26,947	Dispensary	...	...	...	...	...
		...	...	...	...	118	...	Belgaum — Do.	...	Jail	...	..	...	...	...
		..	...	...	...	...	84	Belgaum — Gokak	12,612	Dispensary	...	...	...	...	...
		..	..	...	...	122	99	Belgaum — Athni	9,988	Do.	68	54	...	107	15
		...	..	...	...	240	183		49,547		68	54	...	107	15
		...	...	...	...	...	...	Dhárwad — Gadak	8,069	Dispensary	...	...	...	...	...
		..	...	...	...	40	79	Dhárwad — Hubli	37,967	Do.	20	20	...	35	5
		...	...	...	...	21	...	Dhárwad — Dhárwád	...	Jail	17	4	...	18	2
		...	...	...	...	61	79		46,036		37	24	...	53	7
		...	...	...	...	746	639	Kánara — Kárwár	13,263	Civil Hospital	288	240	114	390	24
		...	...	...	...	113	1,470	Kánara — Kárwár	...	Dispensary	62	37	40	54	4
		..	..	...	...	16	23	Kánara — Hálpur	1,431	Do.	9	7	...	11	5
		...	..	...	...	60	50	Kánara — Mundegod	97	Do.	33	27	...	37	23
		..	..	...	...	103	129	Kánara — Honáwar	4,586	Do.	65	36	39	61	1
		...	..	...	...	121	109	Kánara — Sirsi	5,329	Do.	67	49	26	77	13
		...	..	...	...	21	81	Kánara — Haliál	4,495	Do.	15	5	6	11	3
		...	..	...	...	18	7	Kánara — Supá	363	Do.	8	10	6	7	5
		...	..	...	...	658	633	Kánara — Kumptá	11,640	Do.	345	278	79	508	36
		...	...	...	...	24	...	Kánara — Siddapur	2,157	Do.	21	3	...	20	4
		...	..	...	...	1,880	3,146		44,234		913	692	310	1,176	118
		...	...	...	...	73	82	Kaládgi — Bágalkot	14,002	Dispensary	47	26	...	53	15
		...	...	...	...	....	20	Kaládgi — Bijápur	11,690	Do.	...	...	...	...	...
		..	...	...	...	7	...	Kaládgi — Kaládgi	36,592	Do.	4	3	...	1	3
		...	...	...	...	80	102		32,284		51	29	...	59	18
		...	...	...	...	518	636	Sáwantwádi	8,017	Dispensary	184	168	46	226	80
		...	...	...	...	823	980	Kolhápur	38,979	Civil and Police Hospital	219	198	8	368	33
Total ...		...	..	..	...	3,602	5,126		219,067		1,472	1,165	364	1,989	712

9									10					11		12
VACCINE OPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES, EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccination.	Average number of persons vaccinated by each vaccinator.
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	...	...	...	...	...	...	...	43	70	5	118	...	...	38·0	118
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	35	87	94	21	7	122	...	...	...	...	...	...	81·7	...	122
...	...	35	87	94	21	7	122	...	43	70	5	118	...	81·7	38·0	120
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	12	28	35	5	...	40	...	...	...	...	...	...	87·5	...	40
...	1	2	19	16	2	3	21	...	...	...	...	...	...	88·8	...	21
...	1	14	47	51	7	3	61	...	...	...	...	...	...	87·9	...	30
...	...	134	394	451	99	8	558	30	83	154	...	237	19	82·0	38·0	746
...	1	32	67	87	12	1	100	1	4	10	...	14	...	87·8	28·5	113
...	...	8	8	7	9	...	16	...	...	...	...	...	...	43·7	...	16
...	...	5	55	35	25	...	60	...	...	...	...	...	...	58·3	...	60
...	...	...	101	100	1	...	101	...	2	...	...	2	...	99·0	100	103
...	...	46	70	116	5	...	121	5	4	1	...	5	...	95·8	80·0	121
...	...	14	6	20	...	...	20	...	1	...	...	1	...	100	100	21
...	...	...	18	13	3	2	18	...	...	...	...	...	...	81·2	...	18
...	...	139	484	589	46	12	647	24	13	21	1	35	...	92·7	38·2	658
...	...	2	22	24	...	...	24	...	...	...	...	...	...	100	...	24
...	1	380	1,225	1,442	200	23	1,665	60	107	186	1	294	19	87·8	36·5	188
...	...	42	31	73	...	...	73	...	...	...	...	...	...	100	...	73
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	3	1	6	6	...	1	7	...	...	...	...	...	...	100	...	7
...	3	43	37	79	...	1	80	...	...	...	...	...	...	100	...	26
...	...	169	183	336	95	7	368	16	98	63	5	166	...	93·0	60·8	518
...	8	166	251	363	14	40	417	...	298	98	10	406	...	96·2	75·2	823
...	13	807	1,830	2,365	267	81	2,713	76	546	417	21	984	19	89·8	35·9	163

1	2	3		4		5		6	7	8	PRIMARY				
											A.		B.		
											Sex.		Caste.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.								
Western Circle.	T. Cody, Surgeon.	...	..	...	...	20	...	Thána Jail ...	...	Jail	...	...	...	...	...
		...	...	...	...	17	32	Thána Town.	14,299	Police Corps.	8	9	...	17	...
		...	...	...	...	56	92	Thána Town	...	Dispensary ..	33	23	9	34	4
		...	...	...	...	73	66	Bandora ...	7,746	Do. ...	33	40	43	22	8
		...	...	...	...	161	207	Kalián ...	12,804	Do. ...	68	93	...	139	15
		...	...	...	...	142	98	Kurlá ...	3,000	Do. ...	72	70	22	101	12
		...	...	...	...	60	...	Uran ...	8,690	Do. ...	28	32	1	49	10
		...	...	...	...	37	45	Bhiwandi ...	15,984	Do. ...	18	18	...	25	11
		...	...	...	...	197	105	Bassein ...	9,713	Do. ...	106	89	110	81	4
		...	...	...	...	73	109	Kelwe Mahim.	6,400	Do. ...	35	37	...	72	...
		...	...	...	...	10	10	Mat heran ...	...	Do. ...	5	5	...	9	1
		...	...	...	...	846	764	Thana.	78,636		406	416	185	549	65
		...	...	...	...	209	207	Alibag ...	5,473	Dispensary...	103	97	...	177	9
		...	...	...	...	121	61	Pen ...	6,514	Do. ..	71	50	..	111	...
		...	...	...	...	330	268	Kolaba.	11,987		174	147	...	288	9
		...	...	...	...	164	77	Penth ...	2,004	Dispensary...	81	83	...	158	6
		...	...	...	...	245	227	Ioli	17,461	Do. ...	129	116	..	206	39
		...	...	...	...	48	...	Sinnar ...	9,153	Do. ..	32	16	...	46	2
		...	...	...	...	34	...	Dindorí ...	2,316	Do. ...	21	13	...	33	1
		...	..	...	...	491	304	Nasik.	30,934		263	228	...	443	48
		...	...	...	...	239	110	Dharangaon.	10,385	Bhil Corps Hospital.	33	28	2	40	19
		...	...	...	...	297	236	Irandol ...	11,077	Dispensary...	155	142	...	255	42
		...	...	...	...	131	232	Párolá ...	14,066	Do. ...	61	70	...	127	4
		...	...	...	...	667	578	Khandesh.	35,528		249	240	2	422	65
Total ...		...	...	...	...	2,334	1,914		157,085		1,092	1,031	187	1,702	187

9									10					11		12
VACCINE OPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES, EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Pársi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	...	...	...	...	...	...	...	...	6	14	...	20	...	...	30·0	20
...	...	12	5	17	...	...	17	...	...	...	...	...	...	100	...	17
9	...	25	31	48	10	...	58	2	...	...	...	...	...	82·7	...	56
...	...	19	54	56	14	3	73	...	...	...	...	...	...	80·0	...	73
6	1	75	86	108	26	32	166	5	...	...	...	...	...	80·5	...	161
...	7	24	118	118	12	12	142	...	...	...	...	...	...	90·1	...	142
...	...	17	43	57	3	...	60	...	...	...	...	...	...	95·0	...	60
...	...	14	22	15	25	...	40	4	1	...	...	1	...	37·5	100	37
...	...	93	102	128	56	20	204	9	1	1	...	2	...	69·0	50·0	197
...	...	41	31	52	35	...	87	15	...	1	...	1	...	59·7	...	73
...	...	3	7	8	2	...	10	...	...	...	...	...	...	80·0	...	10
15	8	323	499	607	183	67	857	35	8	16	...	24	...	76·8	33·3	77
...	14	94	106	182	18	...	200	...	8	1	...	9	...	91·0	88·8	209
...	10	66	55	107	21	2	130	9	...	...	...	...	...	83·5	...	121
...	24	160	161	289	39	2	330	9	8	1	...	9	...	88·1	88·8	165
...	...	10	154	162	3	...	165	1	...	...	...	...	...	98·1	...	164
...	...	143	102	204	34	7	245	...	...	...	...	...	...	85·7	...	245
...	...	22	26	43	5	...	48	...	...	...	...	...	...	89·5	...	48
...	...	18	16	34	...	...	34	...	...	...	...	...	...	100	...	34
...	...	193	298	443	42	7	492	1	...	...	...	...	..	91·3	...	123
...	...	27	34	51	10	1	62	1	170	48	...	218	40	83·6	77·9	239
...	...	123	174	279	8	10	297	...	...	...	...	...	...	97·2	...	297
...	...	59	72	109	15	7	131	...	...	...	...	...	...	83·2	...	131
...	...	209	280	439	33	18	490	1	170	48	...	218	40	93·0	77·9	222
15	32	885	1,238	1,778	297	94	2,169	46	186	65	...	251	40	85·6	74·1	116

1	2	3		4		5		6	7	8	Primary				
											A.		B.		
											Sex.		Caste.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1072-73.								
Eastern Gujaráth Circle.	Mancharji Beramji Colá, M.D.	...	...	...	...	281	322	Kheda. Borsad ...	12,214	Dispensary...	143	133	7	231	38
		...	...	...	...	180	186	Kheda. Dákor ...	7,740	Do. ...	89	90	...	165	13
		...	...	...	...	299	484	Kheda. Kapatbanj ...	13,982	Do. ..	145	154	...	183	116
		...	...	...	...	193	193	Kheda. Mahudá ...	9,384	Do. ...	94	99	...	128	57
		...	...	...	...	201	91	Kheda. Mahamudábâd.	8,065	Do. ...	97	103	...	170	30
		...	...	...	...	...	20	Kheda. Nariád ...	24,551	Do. ...	...	...	...	...	...
		...	....	...	...	1,154	1,296		75,936		568	579	7	877	254
		...	...	...	...	476	422	Panch Mahals. Godhrá. ...	10,641	Dispensary...	240	226	...	190	260
		...	...	...	...	360	471	Broach. Jambusar ...	14,924	Dispensary...	189	169	...	333	24
		...	...	...	...	142	67	Broach. Ankleshwar .	9,414	Do. ...	71	71	...	93	42
		...	...	...	...	112	63	Broach. Hansot ...	4,152	Do. ...	69	43	...	84	26
		...	...	...	..	46	110	Broach. Elao... ...	1,915	Do. ...	19	25	...	40	...
		...	...	...	...	660	711		30,405		348	308	...	550	92
		...	...	...	...	214	185	Surat. Balsád ...	11,315	Dispensary...	97	117	1	159	33
		...	...	...	...	58	86	Surat. Káli wádi ...	1,532	Victoria Dispensary. ...	37	21	...	24	12
		...	...	...	...	122	150	Surat. Párdi ...	4,568	Dispensary...	59	62	...	99	7
		...	...	...	...	84	102	Surat. Chikli ...	2.500	Do. ...	39	45	...	70	14
		...	...	...	...	133	70	Surat. Bárdoli ...	4,089	Do. ...	56	76	...	108	24
		...	...	...	...	169	210	Surat. Mándvi ...	4,256	Do. ...	81	88	...	158	10
		...	...	...	...	207	208	Surat. Ráudir ...	11,000	Do. ...	101	106	...	171	36
		...	...	...	...	937	1,011		39,260		470	515	1	789	136
		...	...	...	...	117	101	Mahi Kantha. Sádrá ...	6,749	Mahi Kantha Agency Dispensary	52	42	...	89	5
		...	...	...	...	90	65	Rewa Kántha. Báriá ...	2,891	Dispensary..	54	36	...	65	7
Total ...		...	...	...	...	3,484	3,606		165,882		1,732	1,706	8	2,561	754

9									10					11		12
VACCINE OPPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		Average number of persons vaccinated by each vaccinator.
		C.		D.			E.	F	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	...	225	51	259	11	6	276	...	5	...	...	5	...	95·9	100	281
1	...	128	51	158	37	2	197	18	...	1	...	1	...	81·0	...	180
...	...	255	44	273	13	13	299	...	...	...	...	...	...	95·4	...	299
...	8	144	49	179	13	1	193	...	...	...	...	...	...	93·2	...	193
...	...	150	50	184	11	16	211	11	1	...	...	1	...	93·8	100	201
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
1	8	902	245	1,053	85	38	1,176	29	6	1	...	7	...	92·5	85·7	230
...	16	342	124	456	7	3	466	...	4	6	...	10	...	98·4	40·0	476
1	...	224	134	337	...	21	358	...	1	1	...	2	...	100	50·0	360
7	...	87	55	141	...	1	142	...	...	...	...	...	...	100	...	142
2	...	62	50	109	2	1	112	...	...	...	...	...	...	98·1	...	112
4	...	30	14	44	1	2	51	7	1	1	...	2	...	89·7	50·0	46
14	...	403	253	631	7	25	663	7	2	2	...	4	...	98·9	50·0	165
21	...	106	108	183	19	12	214	...	...	...	...	...	...	90·5	...	214
22	...	19	39	57	...	1	58	...	...	...	...	...	...	100	...	53
15	...	48	73	118	7	...	125	4	1	...	...	1	...	94·4	100	122
...	...	46	38	84	...	...	84	...	...	...	...	...	...	100	...	84
...	...	77	55	128	4	...	132	...	...	1	...	1	...	96·9	...	133
1	...	96	73	150	6	13	169	...	...	...	...	...	...	96·1	...	169
...	...	129	78	207	...	...	207	...	...	...	...	...	...	100	...	207
59	...	521	464	927	36	26	989		1	1	...	2	...	96·2	50·0	141
...	...	76	18	52	38	4	94	...	6	15	2	23	...	57·7	28·5	117
...	18	28	62	85	5	...	90	...	...	...	...	...	...	94·4	...	90
74	42	2,272	1,169	3,204	178	96	3,478	40	19	25	2	46	...	94·7	43·1	174

1	2	3		4		5		6	7	8	PRIMARY				
											A.		B.		
											Sex.		CASTE.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christain.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.								
Western Gujarath Circle.	E. R. Butler, M.D., Surgeon Major.	...	...	...	...	126	224	Ahmadabad. Veramgâon...	19,661	Dispensary...	60	66	...	58	68
		...	...	...	...	256	256	Sânand ...	7,229	Do. ...	144	112	...	245	10
		...	...	...	...	326	209	Prântej ...	8,341	Do. ...	166	147	...	271	42
		...	...	...	...	165	489	Dholkâ ...	20,854	Do. ...	92	73	...	90	75
		...	...	...	...	...	...	Dhanduká ...	9,782	Do. ...	...	...	...	...	...
		...	...	...	..	342	247	Dholerá ...	12,468	Do. ...	185	156	...	293	48
		...	...	...	...	256	197	Gogo ...	9,571	Do. ...	141	113	6	146	102
		...	...	...	...	1,471	1,622		87,906		788	667	6	1,103	345
		...	...	...	...	64	35	Kâthewâd. British Station of Wadwân.	1,059	Wadwan dispensary.	38	26	1	57	6
		...	...	...	...	...	22	British Station of Manikwada.	1,000	Manikwada dispensary.	...	...	...	...	...
		...	...	...	...	6	...	British Station of Songad or Sonpuri.	890	Songad or Sonpuri dispensary	3	3	...	6	...
		...	...	...	...	70	57		2,949		41	29	1	63	6
		...	...	...	...	602	...	Kâthewâd States. Gondhal ...	13,235	Dispensary...	306	269	...	466	109
		...	...	...	...	357	...	Dhoráji ...	16,707	Do. ...	214	142	...	210	146
		...	...	...	...	...	...	Bhâyawadar.	5,998	Do. ...	...	...	...	...	...
		...	...	...	...	78	...	Upletá ...	7,120	Do. ...	36	42	...	38	37
		...	...	...	...	...	...	Sarsai ...	1,453	Do. ...	...	...	...	...	...
		...	...	...	...	1,037	...		44,513		556	453	...	714	292
Total ...		...	...	...	...	2,578	1,679		135,368		1,385	1,149	7	1,880	643

9									10					11		12
VACCINE OPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES, EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		Average number of persons vaccinated by each vaccinator.
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	..	97	29	123	1	2	126	...	...	...	...	...	...	99·1	...	126
1	...	186	70	222	32	8	262	6	...	...	...	...	...	87·4	...	256
..	...	236	77	309	4	...	313	...	13	...	...	13	...	95·5	100·	326
...	...	127	38	156	6	3	165	...	...	...	...	...	...	96·2	...	165
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	161	180	318	13	10	341	...	1	...	...	1	...	96·0	100·	342
...	...	137	117	223	23	11	257	3	...	2	...	2	...	90·6	...	256
1	...	944	511	1,351	79	34	1,464	9	14	2	...	16	...	94·4	87·5	245
...	...	18	46	41	21	2	64	...	...	...	...	...	...	64·5	...	64
...	...	...	...	...	...	..	...	...	...	...	...	...	...	...	...	...
...	...	...	6	...	6	...	6	...	...	...	...	...	...	...	.	6
...	...	18	52	41	27	2	70	...	...	...	...	...	...	60·2	...	35
...	...	264	311	477	66	41	584	9	19	7	1	27	...	87·7	73·0	602
...	...	131	225	311	27	18	356	...	...	1	...	1	...	90·6	..	357
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	....	...
...	3	28	50	71	2	5	78	...	...	...	...	...	...	97·2	...	78
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	..
...	3	423	586	859	95	64	1,018	9	19	8	1	28	...	90·0	70·3	345
1	3	1,385	1,149	2,251	201	100	2,552	18	33	10	1	44		91·8	76·7	171

1	2	3		4		5		6	7	8	PRIMARY				
											A.		B.		
											SEX.		CASTE.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.								
Sindh Circle.	J. Williams, M.D., Surgeon.	...	...	...	...	22	39	Karachi	51,822	Dispensary	14	4	...	2	1
		...	...	...	...	11	13	Manorá	809	Do.	9	2	1	3	
		...	...	...	...	228	61	Ketí Bandar	2,199	Do.	130	98	...	123	97
		...	...	...	...	106	177	Mirpur	2,846	Do.	62	44	...	42	64
		...	...	...	...	342	109	Tátá	7,951	Do.	233	108	...	198	143
		...	...	...	...	177	48	Jarrak	1,666	Do.	98	79	...	57	120
		..	...	...	...	51	62	Bulá Kháns' Tándá.	1,244	Do.	17	34	...	13	38
		...	...	...	...	81	105	Sehwan	4,294	Do.	54	27	2	34	45
		...	...	...	...	1,018	614	Kyrachi.	72,831		617	396	3	472	525
		...	...	...	....	323	32	Mehar	1,246	Dispensary	193	28	...	85	136
		...	...	...	...	531	243	Lárkhánd.	10,643	Do.	354	177	1	224	306
		...	...	...	...	303	537	Rohri	8,781	Do.	174	129	...	133	166
		...	...	...	...	1,157	812	Shikarpur.	20,670		721	334	1	442	66
		...	...	...	...	154	79	Tharoshá	2,219	Dispensary	89	65	...	105	45
		...	...	...	...	200	55	Hálá	4,104	Do.	114	86	...	61	139
		...	...	...	...	421	106	Aliyar-ká-Tandá.	3,923	Do.	263	158	...	230	191
		...	...	...	...	129	130	Mahammad Khan's Tanda.	3,672	Do.	72	35	...	61	46
		...	...	...	...	904	370	Haidrabad.	13,918		538	344	...	457	425
		...	...	...	...	105	54	Nagar Parkar.	2,425	Dispensary	61	44	...	84	21
		...	...	...	...	177	104	Mitti	2,580	Do.	91	86	...	117	20
		...	...	...	...	224	95	Umarkot	3,999	Do.	126	98	...	200	24
		...	...	...	...	95	80	Kipra	1,460	Do.	60	35	...	85	10
		...	...	...	...	601	333	Thar and Parkar.	10,464		338	263	...	486	7

9									10					11		12
VACCINE OPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES, EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator
4	...	3	15	12	4	2	18	...	2	1	1	4	..	75·0	66·6	22
1	...	6	5	4	7	...	11	...	...	...	...	...	...	36·4	...	11
.	8	54	174	199	19	19	237	9	...	...	...	..	...	91·3	...	228
...	...	42	64	85	6	15	106	...	...	...	...	...	...	93·4	...	106
...	...	60	281	272	72	20	364	23	...	1	...	1	...	79·0	...	342
...	...	51	126	161	16	...	177	...	...	...	...	...	...	90·9	...	177
...	...	22	29	39	12	2	53	2	...	...	...	...	...	76·5	...	51
...	...	21	60	58	7	16	81	...	...	...	..	...	...	89·2	...	81
5	8	259	754	830	143	74	1,047	34	2	2	1	5	...	85·3	50·0	127
...	...	45	176	207	2	14	223	2	92	...	10	102	...	99·0	100	323
...	...	220	311	422	21	88	531	...	...	...	...	...	...	95·2	...	531
...	4	193	110	296	...	7	303	...	...	...	...	...	...	100·	...	303
...	4	458	597	925	23	109	1,057	2	92	...	10	102	...	97·5	100	385
..	...	81	73	132	18	17	167	13	...	...	...	...	...	88·0	...	154
...	...	76	124	187	6	7	200	...	...	...	...	...	...	96·9	...	200
..	...	108	313	420	1	...	421	...	...	...	...	...	...	99·7	...	421
...	...	44	63	104	3	...	107	...	19	...	3	22	...	97·2	100	129
...	...	309	573	843	28	24	895	13	19	...	3	22	...	96·7	100	226
...	...	53	52	105	...	...	105	...	...	...	...	...	...	100	...	105
...	40	97	80	174	3	...	177	...	...	...	...	...	...	98·3	...	177
...	...	50	174	206	16	2	224	...	...	...	...	...	...	92·8	...	224
...	...	32	63	95	...	...	95	...	...	...	...	...	...	100	...	95
...	40	232	369	580	19	2	601	...	...	...	..	...	...	96·8	..	150

1	2	3		4		5		6	7	8	PRIMARY					
											A.		B.			
											SEX.		CASTE.			
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1873-74.	1872-73.	1873-74.	1872-73.	1873-74.	1872-73.								
Sindh Circle.	J. Williams, M.D., Surgeon.	...	...	...	...	...	...	Frontier Upper Sindh } Jacobabad.	5,205	Dispensary...	...	...	...	...	...
		...	...	...	...	110	326	Mekran Coast. } Goádar ...	6,000	Dispensary...	50	59	...	...	109
Total		...	...	...	...	3,790	2,455		129,088		2,264	1,396	4	1,857	1,742
Grand Total.		...	...	...	...	19,989	18,631		11,33,928		10,160	8,400	638	13,450	4,066

Details of Column 5.

Total number of persons vaccinated	19,989
Deduct persons re-vaccinated	1,429
Number of persons primarily vaccinated	18,560

Details of Primary Vaccinations.

Total number of operations (Col. 9 E)...	
Deduct persons vaccinated	
Number of operations in excess of	

9									10					11		12
VACCINE OPERATIONS.									RE-VACCINATIONS.					PERCENTAGE OF SUCCESSFUL CASES, EXCLUDING THOSE UNKNOWN FROM THE TOTAL.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		AGE.		RESULT.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
..	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	9	100	67	38	4	109	...	1	...	...	1	...	63·8	100	110
5	52	1,267	2,393	3,245	251	213	3,709	49	114	2	14	130	...	92·8	98·2	180
99	307	8,551	10,009	16,403	1,522	968	18,893	333	913	533	42	1,488	59	91·5	63·1	167

Details of Re-vaccinations.

... ...	18,893	Total number of operations (Col. 10 D).	1,488
... ...	18,560	Deduct persons re-vaccinated...	1,429
persons	33	Number of operations in excess of persons...	59

C.—VACCINATION DEPARTMENT.

STATEMENT No. VI. showing particulars of vaccination in the Bombay Army, 1873-74.

European Army.	Number successfully vaccinated.								
	Europeans.				Natives.				Total.
	Males.	Females.	Children.	Total.	Males.	Females.	Children.	Total.	
Regiments	465	32	369	866	8	...	...	8	874
Lines	...	...	...	...	7	...	166	173	173
Bazaars	...	...	...	...	...	...	75	75	75
Total.....	465	32	369	866	15	...	241	256	1,122*

* These are for the year 1873.

Strength of Europeans.....	Men.....	11,069
	Women	1,227
	Children.....	2,227
	Total...	14,523

Native Army.	Number of vaccinators.		Total number of persons vaccinated and re-vaccinated.		Strength.			Primary Vaccinations.													Re-vaccinations.				Percentage of successful cases, excluding those "unknown" from the total.	
								Sex.		Caste.						Age.		Result.				Result.					
	1		2		3			4		5						6		7			8	9			10	11	
	1873-74.	1872-73.	1873-74.	1872-73.	Europeans.	Natives.	Total.	Males.	Females.	Christian.	Hindú.	Musalmán.	Pársi.	Other castes.		Under 1 year.	Above 1 year.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	In primary vaccination.	In re-vaccination.
Regiments.....	...	...	4,702	4,490	843	44,865	45,708	1,084	1,127	73	1,619	441	3	75		1.475	736	2,006	227	57	2,290	1,115	1,258	136	2,509	89·8	46·9
* Camp Followers	4	4	3,530	2,523	1,992	61,997	63,989	1,754	1,700	147	2,408	829	39	31		2,725	729	3,239	297	68	3,604	67	8	1	76	91·6	89·3
Total....	4	4	8,232	7,013	2,835	106,862	109,697	2,838	2,827	220	4,027	1,270	42	106		4,200	1,465	5,245	524	125	5,894	1,182	1,266	137	2,585	90·9	48·2

* Regimental Lines or Bazaar and Cantonment Bazaar.

Details of Column 2.

Total number of persons vaccinated.....	8,232
Deduct persons re-vaccinated.....	2,567
Number of persons primarily vaccinated	5,665

Details of Primary Vaccinations.

Total number of operations (Column 8)	5,894
Deduct persons vaccinated	5,665
Number of operations in excess of persons ..	229

Details of Re-vaccinations.

Tot number of operations (Col. 10).....	2,585
Dect persons re-vaccinated.....	2,567
Number of operations in excess of persons	18

RETURN of Small-pox in European Army for 1873.

		Remained.	Admitted.	Total.	Recovered.	Died.	Remaining.	Total.	Previously vaccinated.
Regiments	Males	...	4	4	4	...	...	4	4
	Females	...	2	2	2	...	...	2	2
	Children	...	4	4	3	* 1	...	4	4
	Total ..	...	10	10	9	* 1	...	10	10

* This was a girl of 16 years old, vaccinated in infancy and re-vaccinated in 1864.

RETURN of Small-pox in Native Army for 1873-74.

		Remained.	Admitted.	Total.	Recovered.	Died.	Remaining.	Total.	Previously vaccinated.
Regiments	Males	14	37	51	38	1	12	51	44
	Females	10	12	22	21	†1	...	22	22
	Children	25	39	64	57	3	4	64	55
Regimental Lines or Bazárs	Males	2	4	6	6	...	...	6	4
	Females	1	2	3	3	...	...	3	1
	Children	14	22	36	35	1	...	36	35
	Total ...	66	116	182	160	†6	16	182	161

† 1 Transferred.

D.

VACCINE DEPARTMENT.

D VACCINE DEPARTMENT.

STATEMENT No. VII.

SUMMARY of the diaries of superintendents of vaccination and their assistants for the year 1873-74.

Circle.	Name of Superintendent.	Name of Assistant superintendent.	Name of Collectorate.	Táluká.	Number of encampments. Superintendent.	Number of encampments. Assistant superintendent.	Number of encampments. Total.	Number of travelling days. Superintendent.	Number of travelling days. Assistant superintendent.	Number of travelling days. Total.	Number of miles travelled. Superintendent.	Number of miles travelled. Assistant superintendent.	Number of miles travelled. Total.	Number of villages visited. Superintendent.	Number of villages visited. Assistant superintendent.	Number of villages visited. Total.	Number of vaccinated children inspected. Superintendent.	Number of vaccinated children inspected. Assistant superintendent.	Number of vaccinated children inspected. Total.	Total number of children vaccinated and re-vaccinated during the year 1873-74.	Deaths from small-pox in 1873.
Presidency	1	...	...	City of Bombay ...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	13,907	709
Poona Division		Trimbak Anant.	Púna.	Haweli	14	23	37	16	72	88	194	721	915	22	93	115	546	2,443	2,989	4,589	125
				Máwal	...	15	15	...	31	31	...	447	447	...	60	60	...	968	968	1,547	14
				Khed	4	20	24	9	36	45	98	428	526	21	44	65	694	875	1,569	1,582	37
				Junar	3	9	12	5	17	22	79	158	237	26	51	77	449	613	1,062	1,668	5
				Purandhar	3	24	27	4	41	45	47	519	566	11	71	82	190	1,229	1,419	1,792	37
				Sirúr	2	23	25	3	47	50	32	424	456	7	41	48	147	472	619	778	28
				Indápur	2	12	14	3	15	18	124	227	351	2	39	41	189	711	900	1,397	10
				Bhimthadí	2	10	12	2	26	28	18	326	344	5	47	52	203	721	924	1,736	46
		1	1		30	136	166	42	285	327	592	3,250	3,842	94	446	540	2,418	8,032	10,450	15,089	302
		Rámji Khanderáo.	Ahmadnagar.	Nagar	3	29	32	7	46	53	65	339	404	11	52	63	835	1,512	2,347	3,296	19
				Ráhurí	4	17	21	6	14	20	54	182	236	21	52	73	554	1,033	1,587	2,718	12
				Párner	1	28	29	1	25	26	14	294	308	6	39	45	114	553	667	1,019	31
				Srigundi	...	17	17	...	19	19	...	203	203	...	43	43	...	937	937	1,160	1
				Karjat	...	28	28	...	28	28	...	491	491	...	61	61	...	1,810	1,810	1,689	10
				Newásá	2	18	20	5	24	29	22	183	205	12	50	62	295	1,064	1,359	1,908	45
				Ankolá	...	11	11	...	18	18	...	168	168	...	46	46	...	631	631	1,440	1
				Jámkhed	...	6	6	...	11	11	...	87	87	...	29	29	...	797	797	1,786	129
				Kopargáon	1	10	11	2	11	13	25	97	122	7	24	31	176	640	816	1,556	1
				Sangamner	6	28	34	8	39	47	106	469	575	13	60	73	306	530	836	2,035	3
				Siogáon	1	2	3	2	2	4	38	36	74	7	...	7	108	.....	108	1,425	158
Major.		1	1		18	194	212	31	237	268	324	2,549	2,873	77	456	533	2,888	9,507	11,835	20,032	410

P. S. Turnbull, M.D., Surgeon

		Bálaji Ganesh,	Sholápur.	Sholápur	...	...	1	40	41	2	63	65	57	441	498	2	54	56	78	2,880	2,958	3,765	11
				Mádhe	..	...	1	32	33	3	33	36	137	419	556	5	40	45	...	937	937	1,563	1
				Karmálá	...	...	...	11	11	...	21	21	...	135	135	...	32	32	...	745	745	2,027	14
				Pandharpur	...	...	...	24	24	...	39	39	...	254	254	...	51	51	...	1,886	1,886	2,909	1
				Sángolá	...	...	...	25	25	...	29	29	...	233	233	...	32	32	...	1,411	1,411	1,408	181
				Bársi	...	...	1	23	24	1	34	35	42	248	290	2	36	38	87	1,059	1,146	2,329	20
				Native State. Akalkot	...	...	...	40	40	...	51	51	...	268	268	...	32	32	...	2,296	2,296	1,414	...
		1	1				3	195	198	6	270	276	236	1,998	2,234	9	277	286	165	11,214	11,379	15,417	228
		Bálkrishna Rájárám.	Sátárá.	Sátárá	...	...	...	24	24	...	74	74	...	659	659	...	98	98	...	2,104	2,104	3,518	71
				Mahábleshwar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
				Tásgáon	...	...	...	13	13	...	14	14	...	178	178	...	38	38	...	1,122	1,122	1,812	1
				Jáwalí	...	...	...	16	16	...	19	19	...	207	207	...	56	56	...	1,868	1,868	1,961	22
				Waí	...	...	1	21	22	1	23	24	18	150	168	...	42	45	...	1,341	1,341	1,632	106
				Khataw	...	...	...	12	12	...	15	15	...	170	170	3	35	35	...	820	820	1,609	7
				Wálwá	...	...	...	3	3	...	6	6	...	50	50	...	11	11	...	805	805	4,408	87
				Mán	...	...	...	11	11	...	16	16	...	158	158	...	21	21	...	524	524	1,332	15
				Karhád	...	...	...	19	19	...	31	31	...	173	173	...	40	40	...	2,124	2,124	3,378	136
				Khánápur	..	...	...	15	15	...	18	18	...	150	150	...	34	34	...	524	524	1,869	1
				Patan	...	...	...	14	14	...	19	19	...	189	189	3	37	37	...	1,795	1,795	2,684	103
				Malsiras	...	...	1	10	11	1	16	17	14	148	162	...	47	50	172	1,177	1,349	2,420	1
				Korégáon	...	...	...	14	14	...	19	19	...	153	153	...	38	38	...	1,282	1,282	2,138	44
				Native States. Bhor	...	...	2	22	24	3	33	36	21	326	347	8	74	82	330	1,142	1,472	1,511	...
				Native States. Jat	...	...	...	9	9	...	13	13	...	141	141	...	28	28	...	432	432	1,098	...
				Native States. Atpadi	...	...	...	2	2	...	2	2	...	32	32	...	5	5	...	163	163	357	...
				Native States. Phaltan	...	...	3	15	18	3	18	21	28	155	183	7	34	41	443	625	1,068	1,082	...
		1	1				7	220	227	8	336	344	81	3,039	3,120	21	638	659	945	17,848	18,793	32,839	594
		Bálaji Krishnáji.	Ratnágiri.	Ratnágiri	...	...	...	7	7	...	42	42	...	382	382	...	45	45	...	995	995	2,563	151
				Chiplun	...	...	...	12	12	...	24	24	...	186	186	...	33	33	...	928	928	5,452	20
				Dapuli	...	...	...	27	27	...	66	66	...	555	555	...	81	81	...	1,497	1,497	2,960	128
				Deogarh	...	...	...	14	14	...	18	18	...	352	352	...	51	51	...	2,201	2,201	5,687	98
				Gohagarh	...	...	...	13	13	...	19	19	...	145	145	...	25	25	...	631	631	2,434	23
				Málwan	...	...	...	11	11	...	21	21	...	54	54	...	25	25	...	1,596	1,596	4,249	45
				Rajápur	...	...	...	49	49	...	155	155	...	836	836	...	108	108	...	4,992	4,992	8,248	230
				Sangameshwar	...	...	...	6	6	...	17	17	...	165	165	...	21	21	...	663	663	2,372	17
		1	1				...	139	139	...	362	362	...	2,675	2,675	...	389	389	...	13,503	13,503	33,965	712
Total.	1	5	5				58	884	942	87	1,490	1,577	1,233	13511	14,744	201	2,206	2,407	5,916	60,104	66,020	117,340	2,246
			Belgaum.	Belgáum	...	...	8	11	19	17	16	33	175	124	299	17	14	31	611	632	1,243	3,156	26
				Sampgáon	...	...	2	4	6	9	14	23	106	116	222	11	21	32	671	458	1,129	1,935	24
				Parasgarh	...	...	...	11	11	...	18	18	...	149	149	...	31	31	...	735	735	1,825	113
				Gokák	...	...	..	8	8	...	15	15	..	138	138	...	19	19	...	399	399	2,254	13
				Chikodi	...	..	5	38	43	9	61	70	101	416	547	4	70	74	278	1,926	2,204	3,608	83

Name of Surgeon.	Circle.	Superintendent.	Assistant superintendent.	Taluká.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1873-74.	Deaths from small-pox in 1873.
					Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
BRN.																					
	Dhanikoti Dasharthi.	1	Balawantrao Ganesh.	Bidi ...	...	6	6	...	14	14	...	108	108	4	34	38	164	360	524	1,480	3
				Athni ...	...	28	28	...	32	32	...	363	363	...	45	45	...	417	417	752	7
				Torgal ...	...	7	7	...	16	16	...	115	115	...	26	26	...	662	662	877	...
				Ramdurg ...	...	1	1	...	10	10	...	50	50	...	14	14	...	245	245	859	...
		1			15	114	129	35	196	231	382	1,609	1,991	36	274	310	1,724	5,834	7,558	16,746	299
	Kánada.	1	Swámiráo Rango.	Dhárwad ...	3	24	27	11	25	36	129	452	581	28	62	90	1,131	980	2,111	2,271	52
				Nawalgund ...	...	13	13	...	10	10	...	137	137	...	35	35	...	387	387	1,291	127
				Bankápur ...	4	17	21	9	18	27	94	185	279	16	35	51	268	775	1,043	1,976	110
				Hángal ...	4	16	20	10	23	33	99	209	308	18	54	72	580	1,597	2,177	2,706	36
				Hubli ...	1	21	22	5	32	35	25	215	240	8	68	76	423	1,554	1,977	2,090	228
				Ránibadnur ...	1	8	9	1	7	8	12	76	88	4	10	14	46	137	183	424	117
				Kod ...	4	13	17	5	16	21	57	138	195	6	41	47	255	851	1,106	1,004	97
				Karajghi ...	1	11	12	2	15	17	25	129	154	6	33	39	54	477	531	1,200	242
				Kalghatghi ...	2	14	16	5	13	18	52	130	182	16	38	54	346	570	916	1,286	59
				Ron ...	...	13	13	...	14	14	...	150	150	...	44	44	...	467	467	695	29
				Dambal ...	...	18	18	...	18	18	...	190	190	...	43	43	...	772	772	1,601	153
				Southern Maratha States. Shirhatti	...	...	...	...	...	1	...	13	13	5	1	6	44	14	58	190	...
				Lakshmeshwar	...	1	1	...	...	...	...	9	9	2	...	2	192	.....	192	436	...
				Miraj 2nd	...	2	3	3	1	4	55	21	76	2	1	3	139	7	146	984	...
				Kundegal	1	1	2	1	...	1	21	3	24	3	2	5	91	38	129	1,055	...
				Sávanur	1	1	2	1	1	2	8	17	25	1	1	2	233	19	252	389	...
		1			24	172	196	51	194	245	577	2,074	2,651	115	468	583	3,802	8,645	12,447	19,598	1,250
		1		Karwar ...	2	22	24	7	43	50	41	289	330	7	30	37	618	734	1,352	898	272
				Kumptá ...	3	32	35	8	105	113	76	578	654	14	89	103	1,362	2,420	3,782	3,520	20
				Honáwar ...	2	28	30	4	58	62	61	541	602	6	69	75	142	1,464	1,606	2,178	4
				Sirsi ...	1	3	4	5	7	12	50	46	96	15	10	25	292	107	399	929	83
				Ilápur ...	3	7	10	7	8	15	73	68	141	16	7	23	180	60	240	912	20
				Siddapur ...	2	9	11	4	10	14	62	106	168	13	19	32	247	535	782	2,045	2
				Haliál ...	...	24	24	...	51	51	...	402	402	...	62	62	...	2,141	2,141	3,447	81
		1			13	125	138	35	282	317	303	2,030	2,333	71	286	357	2,841	7,461	10,302	13,909	432

	J. RABY,	Dattu Bélappá.	Kaládgi.	Bágalkot	...	21	21	...	43	43	...	371½	371½	...	74	74	...	1,817	1,817	2,891	55
				Hunugunda	...	16	16	...	25	25	...	194	194	...	54	54	...	1,244	1,244	1,764	34
				Bágewadi	...	17	17	...	29	29	...	241½	241½	...	39	39	...	750	750	759	45
				Badámi	...	15	15	...	17	17	...	125½	125½	...	46	46	...	1,010	1,010	2,035	53
				Mudebihál	...	19	19	...	30	30	...	238½	238½	...	56	56	...	1,175	1,175	1,722	44
				Indi	...	11	11	...	11	11	...	173½	173½	...	24	24	...	588	588	1,155	24
				Sindghi	...	7	7	...	13	13	...	149	149	...	21	21	...	520	520	1,394	63
				Bijápur	...	12	12	...	21	21	...	148½	148½	...	35	35	...	939	939	2,388	13
				Southern Maratha States. Mangalvedá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	154	...
				Southern Maratha States. Mudhol ...	...	6	6	..	13	13	...	69½	69½	...	35	35	...	411	411	1,208	...
				Southern Maratha States. Jamkhandi...	...	11	11	...	15	15	...	108	108	...	26	26	...	589	589	636	...
		1	1		...	135	135	...	217	217	...	1,819½	1,819½	...	410	410	...	9,043	9,043	16,106	331
		Rámachandra Bálají.	Kolhápur States.	Vishálgarh	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,715	...
				Ichalkaranjí	...	8	8	...	28	28	...	177	177	...	27	27	...	1,374	1,374	1,924	...
				Kágal	1	13	14	1	13	14	14	143	157	1	39	40	150	866	1,016	1,582	...
				Gadhinglaj	...	14	14	...	25	25	...	237	237	...	32	32	...	608	608	1,455	...
				Báurá	5	...	5	11	...	11	110	...	110	5	...	5	321	...	321	1,556	...
				Panálá	...	11	11	...	19	19	...	155	155	...	38	38	...	1,111	1,111	1,811	...
				Buthargarh	3	6	9	6	14	20	42	162	204	18	30	48	900	898	1,798	1,946	...
				Shirol...	...	17	17	...	39	39	...	203	203	...	37	37	...	1,207	1,207	1,483	...
				Ajrá	...	3	3	...	18	18	...	93	93	...	34	34	...	1,185	1,185	913	...
				Kolhápur	...	6	6	...	21	21	...	206	206	...	17	17	...	591	591	2,305	...
				Southern Maratha States. Miraj 1st ...	...	4	4	...	12	12	...	101	101	...	11	11	...	343	343	703	...
				Southern Maratha States. Kurandwád 1st.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,627	...
				Southern Maratha States. Do. 2nd.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	573	...
				Southern Maratha States. Sangli ...	...	6	6	...	12	12	...	96	96	...	16	16	...	406	406	837	...
		1	1		9	88	97	18	201	219	166	1,573	1,739	24	281	305	1,371	8,589	9,960	20,430	...
				Sawantwadi	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	6,257	...
Total.	1	5	5		61	634	695	139	1,090	1,229	1,488	9,106	10,594	246	1,719	1,965	9,738	39,572	49,310	93,046	2,312
		Mahadeo Vinayak	Thana.	Salsette	2	24	26	6	46	52	86	390	476	10	37	47	379	680	1,059	1,058	140
				Bassein	5	24	29	6	35	41	47	328	375	5	48	53	147	739	886	1,191	89
				Bhiwandi	2	13	15	6	21	27	79	189	268	14	47	61	335	332	667	1,004	131
				Kalián...	...	8	8	...	12	12	...	97	97	...	16	16	...	229	229	1,284	96
				Dahanú...	3	30	33	4	32	36	36	322	358	14	38	52	755	530	1,285	1,077	111
				Karjat	...	3	3	...	5	5	...	48	48	...	12	12	...	62	62	1,036	39
				Máhim	3	40	43	6	55	61	57	372	429	8	38	46	279	463	742	1,109	242
				Murbád	1	9	10	1	16	17	5	98	103	2	25	27	27	175	202	1,071	52
				Panwel	3	23	26	13	51	64	107	490	597	31	96	127	443	762	1,205	1,435	132
				Sháhpur	9	16	25	15	24	39	151	197	348	37	57	94	819	508	1,327	2,287	33
				Wádá	1	3	4	4	7	11	37	67	104	9	18	27	150	163	313	975	52
				Native State. Jawár ...	6	11	17	8	14	22	64	107	171	12	12	24	427	127	554	2,044	...
					35	204	239	69	318	387	669	2,705	3,374	142	444	586	3,761	4,776	8,531	15,571	1,117

WESTERN

T. Cody, Surgeon.

Circle.	Name of Táluka.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1873-74.	Deaths from small-pox in 1873.
		Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
Gogal.	Kolába.																	
1	Alibág ...	...	15	15	...	32	32	...	124	124	...	23	23	...	256	256	1,444	59
	Mángáon ...	...	36	36	...	63	63	...	454	454	...	82	82	...	1,054	1,054	1,862	...
	Máhád ...	...	39	39	...	68	68	...	497	497	...	78	78	...	1,355	1,355	2,188	26
	Pen ...	...	42	42	...	63	63	...	577	577	...	104	104	...	1,424	1,424	1,990	23
	Nagotná Pethá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	26
	Rohá ...	...	25	25	...	51	51	...	370	370	...	62	62	...	702	702	391	7
	Janjirá State. Native	...	22	22	...	38	38	...	279	279	...	39	39	...	1,750	1,750	2,982	...
1		...	179	179	...	315	315	...	2,301	2,301	...	388	388	...	6,541	6,541	10,857	141
	Bálaji Ráyáji.																	
Kisansing Dowlatsing.	Násik ...	5	19	24	8	41	49	100	366	466	12	57	69	270	1,200	1,470	2,443	12
	Igatpuri ...	4	18	22	4	16	20	50	221	271	6	40	46	10	419	429	1,018	5
	Niphád ...	1	7	8	3	12	15	22	96	118	3	26	29	157	137	294	1,450	8
	Chándur ...	2	32	34	4	45	49	26	445	471	2	84	86	239	1,202	1,441	1,617	9
	Sinnar ...	5	15	20	12	21	33	104	178	282	21	33	54	448	318	766	1,399	3
	Máligám ...	4	13	17	9	18	27	61	311	372	8	71	79	652	1,243	1,895	1,396	52
	Althoná Pethá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1
	Báglan ...	5	26	31	9	38	47	108	284	392	27	40	67	601	736	1,337	1,927	16
	Jaikeda Pethá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	47
	Nándgáin ...	1	11	12	3	12	15	41	97	138	6	28	34	140	316	456	1,354	21
	Sáwargáon ...	1	13	14	4	16	20	67	138	205	13	45	58	287	585	872	1,193	5
	Dindori ...	3	18	21	5	22	27	51	254	305	9	29	38	160	659	819	1,447	1
	Peuth State. Native	3	3	6	4	5	9	74	60	134	27	...	27	708	.....	708	990	...
1		34	175	209	65	246	311	704	2,450	3,154	134	453	587	3,672	6,815	10,487	16,234	180
Gogal.	Dhuliá ...	...	23	23	...	46	46	...	543	543	...	62	62	...	1,172	1,172	2,589	30
Desh.	Siwadá ...	5	3	8	11	8	19	161	100	261	32	3	35	1,453	379	1,832	1,700	53
	Nasrábád ...	...	11	11	...	11	11	...	140	140	...	24	24	...	485	485	1,260	44

		Dharmá Bápu and Balkrishna	Khán-	Irandol	...	20	20	...	41	41	...	306	306	...	76	76	...	1,716	1,716	2,285	10
				Jámner	5	11	16	7	17	24	107	225	332	26	25	51	904	410	1,314	1,997	150
				Shirpur	4	3	7	10	5	15	91	63	154	25	4	29	943	63	1,009	1,313	7
				Sháhádé	5	6	11	8	8	16	67	137	204	22	14	36	606	443	1,049	2,010	36
				Talode	1	1	2	6	6	12	67	68	135	17	2	19	317	6	323	669	1
				Nandurbár	4	3	7	9	18	27	67	93	160	15	6	21	219	94	313	902	5
				Chálisgáon	2	14	16	5	22	27	71	270	341	15	28	43	367	297	664	1,573	91
				Pimpalner	5	11	16	11	15	26	106	115	221	19	5	24	548	93	641	2,688	26
				Pachorá	3	6	9	3	12	15	72	104	176	11	22	33	132	346	578	1,257	105
				Chopdé	2	3	5	5	6	11	57	71	128	20	2	22	672	49	721	1,805	24
				Amalner	...	14	14	...	26	26	...	247	247	...	59	59	...	1,323	1,323	1,292	53
				Virdal	1	7	8	3	27	30	11	261	272	7	41	48	467	1,806	2,273	2,375	53
				Bhosáwal ...	3	10	13	3	18	21	38	142	180	9	13	22	361	176	537	1,186	47
		2	1		40	146	186	81	286	367	915	2,865	3,780	218	386	604	6,992	8,858	15,850	26,294	735
To-tal.	1	5	4		109	704	813	215	1,165	1,380	2,288	10321	12609	494	1,671	2,165	14,425	26,984	41,409	68,956	2,173
	MANCHAREJI BERA'MJI COLA, M. D.	Parbhudás Hirji.	Khetá.	Mahmudábád ...	...	8	8	...	30	30	...	282¼	282¼	...	59	59	...	1,469	1,469	2,598	40
				Mátar	...	13	13	...	44	44	...	515	515	...	81	81	...	2,071	2,071	2,481	31
				Nariad	3	9	12	3	38	41	26	211¾	237¾	10	45	55	314	1,124	1,438	3,795	334
				Kapatbanj	1	9	10	...	24	24	...	246½	246½	...	47	47	...	950	950	1,786	106
				Thásrá	2	5	7	5	20	25	72	146	218	13	35	48	408	643	1,051	1,708	161
				Anand	7	9	16	18	28	46	163½	224¼	387¾	28	38	66	1,269	1,136	2,405	1,549	390
				Borsad	8	16	24	14	43	57	126	483½	609½	33	74	107	2,735	3,237	5,972	4,362	273
				Native State. Cámbay ...	2	12	14	7	37	44	60½	371	431½	15	45	60	720	1,414	2,134	2,341	...
		1	1		23	81	104	47	264	311	448	2,480¼	2,928¾	99	424	523	5,446	12,044	17,490	20,620	1,335
		Jethálál Gampatrám.	Panch Mahals.	Godrhá	5	4	9	9	13	22	104½	117	221½	26	45	71	511	548	1,059	1,409	59
				Dohad	2	10	12	8	23	31	78½	150	228½	25	51	76	650	1,392	2,042	2,343	8
				Kalol...	2	4	6	6	10	16	53	73½	126½	20	57	77	539	673	1,212	1,448	36
				Jhálod	3	9	12	9	30	39	94½	250½	345	24	101	125	630	1,455	2,085	1,797	10
				Halol...	5	5	10	13	11	24	88½	82½	171	33	36	69	593	330	923	1,001	5
				Jambugoda	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	.....	4
		1	1		17	32	49	45	87	132	419	673½	1,092½	128	290	418	2,923	4,398	7,321	7,998	122
		Parbhurám Pránshánkar.	Broach.	Broach	...	38	38	...	77	77	...	744	744	...	99	99	...	2,474	2,474	3,197	64
				Jambusar	...	26	26	...	60	60	...	576	576	...	77	77	...	1,896	1,896	2,399	26
				Amod	...	16	16	...	35	35	...	235½	235½	...	33	33	...	713	713	1,058	24
				Wágrá	...	11	11	...	16	16	...	202½	202½	...	46	46	...	927	927	953	25
				Ankleshwar	3	27	30	7	57	64	173	491	664	21	86	107	438	1,334	1,772		20
				Hánsot Petha ...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	1,525	7
		1	1		3	118	121	7	245	252	173	2,249	2,422	21	341	362	438	7,344	7,782	9,132	166

EASTERN GUJARATH—*concluded.*

Circle.	Name of Collectorate.	Taluka.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1873-74.	Deaths from small-pox in 1873.
			Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
MANCHARJI BERAMJI COLA, M.D.																			
Jethálal Punjáji.	Assistant superintendent.																		
	1																		
None.																			
	1																		
Kantha.	Mahi Kántha.	Wátrak Kántha	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,059	...
		Rhevar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	191	...
		Náni Márwád	...	...	...	...	...	...	169	169	...	28	28	...	535	535	1,070	1,480	...
		Bávesi	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	863	...
		Katosan	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	2	...
		Vdar ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,814	...
		A'mnagar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,763	...
		Sábar Kántha	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	512	...
	1		...	...	...	...	...	...	...	169	169	...	28	28	...	535	535	7,694	...
	Mahi Kántha.	Lunwádá	...	1	11	12	5	26	31	60	1961/2	2561/2	44	103	147	465	1,071	1,536	2,191	...
		Rájpipla	...	3	17	20	5	36	41	601/2	2781/2	339	21	121	142	460	2,290	2,750	3,100	...
		Bárla ...	...	3	13	16	11	16	27	125	123	248	54	34	88	847	603	1,450	3,822	...
		Bálásinur	...	3	4	7	8	16	24	92½	168	260½	30	36	66	493	348	841	1,091	...
		Surat City	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	2,791	218
		Chorási	...	1	9	3	23	26	332	2371/2	5691/2	...	29	29	...	1,070	1,070	794	48
		Ulpád	...	3	6	13	15	28	126	255	381	34	30	64	642	931	1,573	1,901	96
		Jaláipur	...	...	4	...	24	24	...	284	284	...	57	57	...	1,147	1,147	1,831	19
		Bardoli	...	...	18	...	31	31	...	228	228	...	61	61	...	2,868	2,868	2,690	3
		Mándvi	...	...	11	...	31	31	...	2561/2	2561/2	...	54	54	...	1,140	1,140	1,768	2
		Chikli...	...	...	4	...	29	29	...	2521/2	2521/2	...	52	52	...	1,423	1,423	2,170	...
		Balsád	...	...	19	...	25	25	...	373	373	...	43	43	...	1,465	1,465	1,796	4
		Párdi...	...	...	9	...	34	34	...	1951/4	1951/4	...	44	44	...	832	832	1,617	47
		Dharmpur	...	...	5	...	13	13	...	1021/4	1021/4	...	19	19	...	871	871	2,725	...
		Bánsdá	...	...	4	...	10	10	...	1021/2	1021/2	...	20	20	...	1,324	1,324	2,860	...
		Sachin	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	348	...
	1		...	4	89	16	235	251	458	2,286¾	2,744¾	34	409	443	642	13,071	13,713	23,291	437

			Rewá	Chotá Udaipur ...	4	12	16	8	35	43	100½	223½	324	22	63	85	346	492	838	549	...
				Sunth...	3	12	15	9	30	39	79½	236	315½	30	96	126	526	1,347	1,873	1,734	...
				Kadáná	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	.....	...
				Sankhedá Mewás ...	2	16	18	5	33	38	48	359½	407½	20	79	99	361	806	1,167	888	...
					19	85	104	51	192	243	566	1,585	2,151	221	532	753	3,498	6,957	10,455	13,375	...
Total.	1	4	4		66	405	471	166	1,023	1,189	2,064	9,443½	11,507½	503	2,024	2,527	12,947	44,349	57,296	82,100	2,060
WESTERN GUJARÁ'TH. E. R. BUTLER, M.D., Surgeon Major.		Sardárnniya Nánmiá.	Ahmadábád.	Daskroi	3	5	8	11	31	42	112	259	371	17	51	68	1,373	1,198	2,571	2,000	64
				Ahmadábád City ...	...	3	3	1	18	19	10	24	34	2	2	4	108	150	268	4,580	8
				Dholká	5	5	10	11	31	42	115	210	325	22	29	51	1,350	1,196	2,546	2,546	35
				Dhandúká	2	39	41	8	109	117	91	1,062	1,153	26	88	114	4,232	3,002	7,234	4,690	6
				Veramgáon	4	12	16	11	57	68	84	545	629	24	60	84	718	2,351	3,069	3,045	36
				Sánand	4	12	16	9	36	45	67	449	516	18	64	82	1,106	1,478	2,584	1,892	51
				Prántej	3	4	7	3	16	19	31	161	192	4	28	32	372	657	1,029	1,686	148
				Morásá Pethá ...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....		3
				Gogo...	2	11	13	3	22	25	40	306	346	9	53	62	396	863	1,259	1,081	14
	1	1	1		23	91	114	57	320	377	550	3,016	3,566	122	375	497	9,655	10,895	20,550	21,520	365
		None.	Pálanpur Superintendency.	Dísá	...	...	...	...	...	...	...	..	...	...	...	...	...	.....	.....	1,561	...
				Pálanpur	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	2,785	...
				Dhanerá	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	945	...
				Kákhrej	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	2,105	...
				Deodar	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	73	...
				Tehrwádá	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	.....	...
				Wáo	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	1,039	...
				Tharád	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	650	...
				Sántalpur	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	78	...
				Morwádá	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	258	...
				Wárye	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	794	...
				Charchat	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	51	...
				Jájhám	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	.....	...
				Bábhar	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	7	...
				Suigám	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	.....	...
				Rádhanpur	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	1,980	...
	...	1			...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	12,326	...
		Rancholdás Mangaldás.	Northern Division.	Dhrángdrá	2	9	11	6	15	21	69	154	223	11	19	30	1,019	519	1,538	2,906	...
				Hálwad	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....		...
				Jinjiwádá	...	1	1	...	3	3	30	46	76	6	3	9	1,085	129	1,214	.....	...
				Dasará	...	3	3	...	6	6	...	95	95	...	9	9	...	201	201	2,461	...
				Vitthalgarh	...	...	...	...	...	...	...	..	..	...	..	...	.	.....	.....		...

Surgeon Major. — *concluded.*

Name of		Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1873-74.	Death from small-pox in 1873.
Circle.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
1	2																	
Rankoddas Mangaldas.																		
Northern Division—*concluded.*	Wánod	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Bijáná	...	4	4	...	11	11	...	111	111	...	12	12	...	255	255	...	...
	Jasdan	...	2	4	5	1	6	56	16	72	13	...	13	848	...	848	2,575	...
	Limdi	...	4	4	6	...	6	69	...	69	11	...	11	1,225	...	1,225	2,360	...
	Saéla	...	6	6	11	1	12	126	4	130	23	1	24	624	14	638	2,381	...
	Sudámdá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Múlí	...	...	3	...	9	9	...	105	105	...	9	9	...	518	518	518	...
	Wákáner	...	5	21	11	26	37	152	272	424	18	41	59	723	864	1,587	1,911	...
	Thán	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Wádwan	...	4	13	9	18	27	79	235	314	14	21	35	1,490	517	2,007	3,087	...
		23	46	69	48	90	138	581	1,038	1,619	96	115	211	7,215	2,816	10,031	17,681	...
Western Division.	Dharol	4	4	8	8	11	19	100	95	195	14	15	29	952	481	1,433	...	...
	Judiá	...	...	...	...	4	4	...	59	59	...	6	6	...	219	219	2,078	...
	Jaliá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Diwáni	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Dráphá	...	...	4	...	15	15	...	118	118	...	15	15	...	212	212	1,635	...
	Kondurmá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Dhoráji	...	3	3	...	19	19	...	104	104	...	14	14	...	243	243	...	...
	Gondal	...	9	12	7	34	41	118	162	280	12	19	31	1,230	359	1,589	2,419	...
	Wásáwar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Morví	...	7	7	...	23	23	...	215	215	...	18	18	...	770	770	2,567	...
	Tankárá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Bháinwad	...	8	8	...	20	20	...	135	135	...	13	13	...	365	365	2,221	...
	Jodhpur	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Kharabáliá	...	13	13	12	13	25	138	123	261	28	10	38	1,236	218	1,454	2,112	...
	Nawánagar	...	15	15	16	21	37	177	186	363	35	22	57	2,526	634	3,160	2,475	...
	Rájkot	...	18	18	24	42	66	316	216	532	47	34	81	2,678	949	3,627	...	...
	Gawáridhar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	4,991	...
	Pal	...	...	...	...	2	2	...	18	18	...	2	2	...	12	12	...	...
	Porbandar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	2,894	...
		33	55	88	67	204	271	849	1,431	2,280	136	168	304	8,622	4,462	13,084	23,392	...

Western Gujarát—	E. R. Butler, M.D.	Bálkrishna Rámchandra.	Southern Division.	Dídan	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	1,914	...
				Jafrábád	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....		...
				Bántwá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	2,254	...
				Mánikwádá	...	1	1	...	3	3	...	4	4	...	1	1	...	12	12				...
				Bilká	...	1	1	...	14	14	...	...	...	...	...	...	...	.....	.....			2,137	...
				Bagusrá	...	1	1	...	14	14	...	60	60	...	12	12	...	73	73				...
				Jaitpur	1	1	2	1	8	9	18	10	28	8	1	9	620	19	639	2,505	...		
				Junagarh	...	3	3	...	14	14	...	37	37	...	5	5	...	191	191	1,904	...		
				Mangarul	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	1,375	...		
				Unà	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	2,499	...		
				Viráwal	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....				
				Chorwád	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	1,985	...		
					1	7	8	1	53	54	18	111	129	8	19	27	620	295	915	16,573	...		
			Eastern Division.	Bháwanagar... ...	...	16	16	...	41	41	...	173	173	...	18	18	...	372	372	1,743	...		
				Botád	4	26	30	7	14	21	79	168	247	16	17	33	2,021	742	2,763				
				Láthi...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	2,488	...		
				Kundálá	...	12	12	...	21	21	...	169	169	...	24	24	...	919	919	2,260	...		
				Mowá...	...	24	24	...	28	28	...	200	200	...	46	46	...	1,690	1,690	2,493	...		
				Shehor	...	2	2	...	3	3	...	30	30	...	1	1	...	47	47	1,037	...		
				Talájá	...	22	22	...	31	31	...	187	187	...	41	41	...	835	835	2,351	...		
				Pálitáná	...	33	33	1	40	41	14	260	274	2	48	50	165	1,255	1,420	2,358	...		
				Walá	2	3	5	3	7	10	44	53	97	13	14	27	727	377	1,104	2,453	...		
	1	2			6	138	144	11	185	196	137	1,240	1,377	31	209	240	2,913	6,237	9,150	17,183	...		
Total.	1	3	6		86	343	429	184	867	1,051	2.135	7,026	9,161	393	921	1,314	29,025	25,392	54,417	1,08,675	365		
Sindh.	J. Williams, M.D., Surgeon.	Lachman, Meharchand, Gangárám.	Karáchí.	Karáchí	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	223	2		
				Karáchi Town ...	2	...	2	2	...	2	212	...	212	...	...	...	...	.....	.....	5,454	...		
				Dádú	2	10	12	2	10	12	34	118	152	10	46	56	292	353	645	1,883	...		
				Sehwán	3	8	11	4	4	8	59	118	177	8	39	47	728	237	965	1,059	12		
				Mánjhándá	3	6	9	3	5	8	55	120	175	6	...	6	299	.....	299	618	1		
				Kotri	7	13	20	6	10	16	290	222	512	3	...	3	140	.....	140				
				Kohistán	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	285	...		
				Táttá...	6	12	18	7	12	19	157	178	335	26	...	26	1,325	.....	1,325	1,245	...		
				Mirpur Sákrá ...	3	8	11	3	14	17	32	90	122	3	7	10	210	120	330	873	...		
				Ghorábári	2	13	15	4	11	15	88	134	222	21	15	36	406	140	546	1,248	30		
				Sháhbandar	8	132	140	10	95	105	186	1,739	1,925	62	254	316	1,248	1,165	2,411	2,267	16		
				Játi	7	53	60	8	45	53	185	774	959	38	227	265	1,172	1,109	2,281	1,809	4		
				Belá	4	20	24	5	21	26	85	298	383	17	59	76	592	254	846	1,069	1		
				Mirpur Batorá ...	2	9	11	2	7	9	14	181	195	4	26	30	109	184	293	948	...		
	2	1			49	284	333	56	234	290	1,397	3,972	5,369	198	673	871	6,521	3,560	10,081	18,981	66		

Surgeon.

Circle.	Name of Taluka.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1873-74.	Death from small-pox in 1873.
		Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
Hasa Mal.	Shikárpur ...	2	10	12	3	10	13	43	105	148	2	1	3	55	52	107	2,796	...
	Rohri ...	1	8	9	2	11	13	30	185	215	6	31	37	525	257	782	2,847	...
	Sayadpur ...	1	1	2	2	1	3	36	56	92	7	2	9	473	52	525	2,244	...
	Ghotki ...	1	...	1	2	...	2	22	...	22	4	...	4	273	...	273	1,408	...
	Mirpur Mátelo ...	1	8	9	2	10	12	30	175	205	10	39	49	310	386	696	2,893	...
	Obáoro ...	2	4	6	3	7	10	40	45	85	9	22	31	521	274	795	2,156	1
	Sakkhar ...	2	4	6	3	5	8	32	111	143	6	6	12	560	76	636	3,001	...
	Náoshero ...	2	3	5	2	7	9	30	96	126	4	20	24	244	268	512	3,068	1
	Sujáwal ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Rataderá ...	1	1	2	1	3	4	14	47	61	3	17	20	252	220	472	1,737	...
	Lárkhánáá ...	1	27	28	1	34	35	26	364	390	8	75	83	74	696	770	4,920	1
	Kanbar ...	1	18	19	1	27	28	30	210	240	3	50	53	140	467	607	2,313	1
	Nasirábád ...	1	6	7	1	7	8	14	110	124	1	32	33	14	571	585	2,207	...
	Labdáryá ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	263	...
	Tiger ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	609	...
	Mehar ...	1	5	6	1	7	8	16	67	83	3	26	29	158	191	349	2,466	...
	Kakar ...	3	11	14	3	12	15	25	115	140	6	33	39	292	292	584	2,352	...
		20	106	126	27	141	168	388	1,686	2,074	72	354	426	3,891	3,802	7,693	37,280	6
Asu Mal.	Haidrábád ...	2	6	8	2	14	16	35	213	248	6	34	40	168	486	654	2,394	...
	Haidrabád Town ...	1	4	5	1	12	13	4	20	24	1	4	5	28	149	177	2,054	...
	Guni	2	12	14	2	20	22	31	378	409	5	94	99	187	595	782	1,669	...
	Bágá	1	1	2	3	15	18	45	101	146	17	30	47	607	362	969	1,943	...
	Badin	2	5	7	4	17	21	52	161	213	27	53	80	718	418	1,136	2,103	...
	Derá Mohabat ...	...	2	2	...	4	4	...	81	81	...	6	6	...	51	51	1,025	...
	Aliyár	2	4	6	2	27	29	25	75	100	6	11	17	291	1,011	1,302	1,118	...
	Mirpur Khás ...	...	19	19	...	50	50	...	433	433	...	90	90	...	869	869	1,564	...
	Shahdádpur ...	6	19	25	7	29	36	84	276	360	18	46	64	1,331	671	2,002	1,872	...
	Hálá	4	6	10	4	12	16	55	118	173	5	23	28	482	361	843	2,331	...
	Sakrand ...	2	6	8	2	9	11	40	104	144	8	28	36	299	368	667	2,123	...
	Morá	3	10	13	4	10	14	67	159	226	22	61	83	846	500	1,346	1,350	...
	Naoshero ...	2	6	8	2	17	19	36	194	230	11	52	63	257	391	648	1,584	...
	Khandiárá ...	2	1	3	3	8	11	42	63	105	23	18	41	795	175	970	1,722	5
		29	101	130	36	244	280	516	2,376	2,892	149	550	699	6,009	6,407	12,416	25,357	5
1	1	1	1															

	J. WILLIAMS, M.D.,	Hásá Mal, and Meharchand.	Upper Sindh Frontier.	Jacobabád	1	1	2	1	2	3	9	...	9	1	6	7	206	90	296	1,602	4
				Kásmor	2	18	20	4	18	22	54	270	324	8	1	9	485	13	498	2,306	...
				Thul	3	13	16	3	17	20	12	414	426	5	3	8	99	19	118	1,930	...
		1	1		6	32	38	8	37	45	75	684	759	14	10	24	790	122	912	5,838	4
		Lal Baksh.	Thar and Párkar.	Umarkot	6	29	35	6	35	41	103	624	727	32	91	123	544	617	1,161	3,100	...
				Chachrá	...	31	31	...	24	24	...	297	297	...	104	104	...	1,191	1,191	2,752	...
				Nagar Párkar ...	...	24	24	...	29	29	...	297	297	...	12	12	...	173	173	1,548	...
				Mitti	...	58	58	...	35	35	...	737	737	...	50	50	...	1,069	1,069	2,871	...
				Diplá	4	28	32	6	21	27	112	404	516	23	61	84	336	550	886	1,227	...
				Kiprá	5	19	24	5	28	33	76	375	451	14	99	113	544	617	1,161	1,479	...
				Sánghar	4	32	36	7	29	36	104	342	446	25	70	95	753	389	1,142	1,227	...
		1	1		19	221	240	24	201	225	395	3,076	3,471	94	487	581	3,176	5,451	8,627	14,204	...
		None.	Native State.	Khairpur	3	16	19	4	15	19	51	237	288	5	88	93	538	715	1,253	4,331	...
			...	Jodhpur	...	6	6	...	7	7	...	162	162	...	42	42	...	811	811	954	...
			...	Kachi	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	389	...
Total	1	6	5		126	766	892	155	879	1,034	2,822	12,193	15,015	532	2,204	2,736	20,925	20,868	41,793	1,07,334	81
Grand Total.	6	28	29		506	3,736	4,242	946	6,514	7,460	12,030	61,600½	736,30½	2369	10,745	13,114	92,976	2,17,269	3,10,245	5,91,358*	9,946

* Exclusive of the Baroda, Kutch, and Aden Circles.

BOMBAY:
PRINTED AT THE GOVERNMENT CENTRAL PRESS.

No. 2473.

GENERAL DEPARTMENT.

Bombay Castle, 27th August 1874.

Letter from the Surgeon General, Indian Medical Department, No. 2085, dated 9th July 1874—Forwarding, with his remarks and suggestions, the annual report on vaccination throughout the Presidency and Sind for the year 1873-74.

RESOLUTION.—His Excellency in Council has read this very complete report with much interest and satisfaction. In almost every respect it shows a marked improvement on the preceding year. All the officers have evidently done their best for the progress of Vaccination in the Presidency, and their efforts have been attended with success.

2. The saving which was effected by the re-organization of the Department in 1871 was, under the orders of Government, expended on the improvement of the Department, and the scheme proposed by Dr. Turnbull for disposing of the amount was brought into effect from November last. There are now 9 Circles; and the strength of the whole establishment during the year, as compared with that of 1872-73, was as follows:—

	Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Vaccinators.	Peons.
1872-73.....	1	10	27	12	377	401
1873-74.....	1	9	30	15	381	420

Only 6 of the Vaccinators were paid by Government; the rest were paid by Local Funds, Municipalities or Native States.

3. The number of vaccinations and re-vaccinations during the year was 6,52,223, being 63,866 more than that of the previous year. The increase is distributed thus:—

Itinerary Establishment	...	...	...	...	...	...	...	61,684
Dispensary do.	...	...	...	...	...	...	...	1.358
Army do.	...	...	...	...	...	...	...	824

There is little doubt of the correctness of the returns, as a large percentage, nearly 50 per cent. on the average, was verified, and only one register was found incorrect. The whole result is an evidence of the good effects of the re-organization, and it may also be regarded as showing an increasing appreciation of vaccination on the part of the people.

4. His Excellency in Council is glad to observe that there has been a large increase (37,059) in the vaccination of infants, who suffer most from small-pox, and have therefore most need of protection. In this respect Bombay stands highest, where the percentage was 65·3; it was lowest in the Southern Circle, being only 25.

5. The success in primary vaccinations among the civil population was 94·8, in the army it was only 90·9. For re-vaccinations it was 65·7 in the general returns, 48·2 in the army. If, as Dr. Pinkerton states, the success in

primary vaccinations should be 99 per cent., there is evidently much room for improvement, especially in the army.

6. The returns still show a disparity between the number of males and females vaccinated. This is greatest in the city of Bombay, where the males number 55 per cent. of the whole. For the Presidency generally there are 52·8 males to 47·2 females vaccinated. The cause is propably to be found in the feelings and usages of Native Society. It is satisfactory to observe from a comparison of the results of previous years that there is a gradual decline in the excess of males.

7. The percentages of caste stand very much the same as in the reports of previous years. It is to be hoped that by the completion of the census it will become practicable in future years to show what proportion they bear to each section of the population; but it is evident that some castes have greater prejudices than others against vaccination. The strongest opposition is experienced from the Lingayats in Dharwar, Sholapur and elsewhere, who object particularly to lymph being taken from the vaccinated child's arm. This difficulty might be successfully met by Dr. Turnbull's suggestion to the Barsi Municipality to introduce animal vaccination, being generally adopted.

8. There was an increase of Rs. 5,281-7-5 in the total expenditure during the year, owing principally to the increase of establishment. On the other hand there was a decrease of 6 pies in the cost of each successful vaccination, but it varies considerably in the different establishments, being as follows:—

	1873-74.		1872-73.	
	AS.	P.	AS.	P.
Municipal	5	2	5	10
Local Funds	2	10	3	3
Native States	3	3	3	5

It is highest in the city of Bombay, Rs. 1-1-3. One cause of this is that there is a Superintendent for so small a Circle, his pay adding seven annas to the cost of each successful case. Elsewhere also the cost is largely influenced by the Superintendent's pay. Dr. Pinkerton suggests that no town with less than a population of 20,000 should maintain a Municipal Vaccinator. His Excellency in Council cannot concur, and considers that at any rate the matter should be left to the discretion of the Municipalities themselves.

The total expenditure of the Department during the year under report was Rs. 2,16,076-8-4, contributed by the different sources in the following proportions:—

	Rs.	a.	p.
Imperial	1,05,198	11	9
Municipal	15,659	12	7
Local Funds	59,158	0	6
Native States	36,059	15	6
	2,16,076	8	4

9. The one unsatisfactory feature is the comparatively high cost of each successful vaccination, which on an average amounts to Rs. 0-6-2, and which is understood to be considerably higher than that incurred in any other province in India. The Superintendent General, assuming that the population of the Presidency is 24½ millions, estimates the births at 7,35,000 per annum. If one-thirteenth be written off for deaths, there would remain 6,78,462 child-

ren who might be primarily vaccinated. According to this calculation, nine-tenths of the number were vaccinated last year, which is a result highly creditable to the Department. The average number of operations of each Vaccinators was 1,652, being 146 more than that of the previous year. It was highest in Sind, and lowest in the Presidency Circle.

10. The least satisfactory general results are in the Southern Circle—particularly Belgaum and Dharwar, and in the Presidency Circle. With regard to Belgaum, the Superintendent General remarks that there are too few Vaccinators, while the Collector, Mr. Grey, states that no more can be paid from Municipal or Local Funds. Government trust that the District will not long remain conspicuous for its shortcomings in this respect. The obstinacy of the Lingayats in some of the Talukas in Dharwar is the chief cause of the want of progress there, and some of the Vaccinators are reported to be wanting in energy. It is hoped that these causes will soon disappear. At the same time progress has been made in the Southern Circle since last year, and it is hoped that under Dr. Raby still further improvement will be shown next year. With regard to the falling off in Bombay, the Superintendent and Superintendent General urge that they can do nothing more without a compulsory Vaccination Act, and that in a large city where small-pox is both endemic and epidemic, such an Act is absolutely necessary. It is a measure to be approached with much caution, and seeing the satisfactory progress made elsewhere, His Excellency in Council is not yet convinced of the necessity of legislation of that character.

11. Government are glad to learn that progress is being made in Native States. Baroda is an exception, and in Kutch also Vaccination is in a very backward condition. It appears that there is little inspection or testing in these States, and without this there is little hope of improvement.

12. It is satisfactory also to observe that an improvement has taken place in the vaccination at dispensaries. In the Southern Circle, however, and to a certain extent in the Eastern Gujarát Circle, it appears to have fallen off. Government have already directed that all students at the Grant Medical College should learn vaccination, and there is no doubt that in time Assistant Surgeons and Hospital Assistants will be more efficient in this respect.

13. The lymph is reported to have been generally good, but to have degenerated in Eastern Gujarat from the rain and heat. The animal lymph failed in the Presidency Circle in July and August. It is also stated that the lymph sent out from England was not so successful as usual. The attention of the Secretary of State will be called to the matter, and he will be requested to state where it was obtained. Government are glad to learn that animal vaccination worked fairly in Bombay, and that although the percentage of success was not so large as in the case of human lymph, still it promises to be a valuable adjunct.

14. The deaths from small-pox are given as follows :—

Presidency generally.		City of Bombay.	
1872.	1873.	1872-73.	1873-74.
26,699	9,946	1,637	405

The figures, however, are said to be not reliable, and the Surgeon General states they are not useful for statistical purposes. It would evidently be difficult to trace the connection between vaccination and the deaths from small-pox in any one or two years ; but the figures cannot be so very wide of the truth as not to show that the number of deaths from small-pox during last year was very much smaller than that of the previous year.

15. Government are glad to learn that their orders with respect to examinations have been so promptly attended to, all the Superintendents but one, who is acting, having already passed in a vernacular language. They are also pleased to endorse the view of the Surgeon General with regard to the nature of the work done by the Department, and concur in the commendations bestowed on the Superintendent General, and Drs. Williams, Butler, Cody and Cola. Dr. Turnbull conducted the duties of Acting Superintendent General during the absence of Dr. Pinkerton to the entire satisfaction of Government.

16. It has been suggested by the Army Sanitary Commission that the Vaccination Establishment should be associated with the Sanitary Establishment, and in this opinion Government are disposed to concur. As long as at present the Sanitary Commissioner's duties are mainly limited to the compilation of vital statistics of more than doubtful reliability, but insignificant practical results can be looked for. What is wanted is periodical personal inspection of the large Towns; and as far as possible personal supervision over the preparation of the Returns of vital statistics. The existing very complete organization of the Vaccination Department, with an Assistant Superintendent for each Collectorate, a Superintendent over each Circle, and a Superintendent General over the whole, affords, in the opinion of His Excellency the Governor in Council, the best means of securing these important ends. Authority might also be given with advantage to the Vaccination officers to inspect the village Registers of Births.

17. Government are glad to observe that the assistance given to the Department by Civil and Political Officers is duly acknowledged. Their countenance and support are essential to success.

18. The plan introduced by Dr. Pinkerton for the first time of giving in his report a separate sketch of the operations in each Collectorate is very convenient. His suggestion too in respect to maps is valuable, and he is authorized to apply to the Survey Commissioners for as many copies of both Taluka and District Maps as he may require for the use of the Department.

F. S. CHAPMAN,
Chief Secretary to Government.

To

The SURGEON GENERAL, INDIAN MEDICAL DEPARTMENT,
The COMMISSIONER IN SIND,
The REVENUE COMMISSIONER, N. D.,
The REVENUE COMMISSIONER, S. D.,
All COLLECTORS, including the COLLECTORS and POLITICAL SUPERINTENDENTS in SIND, and the EXTRA FIRST ASSISTANT COLLECTOR in charge PANCH MAHALS,
The MUNICIPAL COMMISSIONER for the CITY of BOMBAY,
The SANITARY COMMISSIONER,
The POLITICAL DEPARTMENT of the SECRETARIAT,
The REVENUE DEPARTMENT of the SECRETARIAT,
The SURVEY and SETTLEMENT COMMISSIONER, N. D., } With reference to
The SURVEY and SETTLEMENT COMMISSIONER, S. D. } the last paragraph.
The COMPILER, BOMBAY ADMINISTRATION REPORT for 1873-74,
The SECRETARY of STATE (by letter).

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SIND—

FOR THE YEAR 1874-75.

Bombay:
PRINTED AT THE GOVERNMENT CENTRAL PRESS.
1875.

No. 2542 A.

To

THE SECRETARY TO GOVERNMENT,

GENERAL DEPARTMENT.

Bombay, 14th June 1875.

SIR,

I have the honour to forward, for the information of the Governor in Council and Her Majesty's Secretary of State for India, the Annual Report on Vaccination in this Presidency and Sindh for the year 1874-75.

2. Briefly, there is progress in all respects. The number of vaccinations are 80,401 more than in the preceding year; the success is higher, the cost of each successful case less, and the conduct of the vaccinators has been satisfactory.

3. The strength of the Department shows 8 more vaccinators than in the preceding year; in other respects there was no change.

4. Dr. Pinkerton describes the Bombay System of vaccination as reorganized in 1871, and says no change either in it or in the constitution of the Circles took place last year; that as far as he can see the system is perfect in theory, and in its application it has realized his best hopes. The work of the year bears out this statement.

5. The total number of persons vaccinated and re-vaccinated were 732,624, being an increase of 80,401, and this increase is chiefly owing to increased exertions of all the officers and vaccinators of the Department. The itinerant vaccinators of the Local Funds establishment contribute 59,605 of the increase and the Native States' vaccinators 20,325; the rest is by Municipal and by the 2 Government vaccinators. There was a decrease in the army, which appears to be due to want of subjects.

6. The primary vaccinations were 671,089, and the re-vaccinations 60,807; the latter were chiefly in Sindh, where there were 48,504. No attempt has been made to push re-vaccination anywhere but in Sindh; because in the other Circles the vaccinators have enough to do to get through their primary vaccinations. By and by more attention will, I hope, be given to re-vaccination in the other circles; Sindh has set the example of what can be done.

[redacted]ad to observe that the disparity in the sexes is [redacted] that it is now probably pretty correct in general, [redacted]y much too high in Aden and Sindh.

[redacted]he percentages of castes differ from the census, but this [redacted]ted to be due to the method of registering the low caste [redacted]s. As there is, Dr. Pinkerton thinks, some inclination on [redacted] part of high caste Hindu vaccinators to avoid contact with [redacted]e Sudras, it is considered the vaccination columns for castes are very suitable for the purpose of preventing them being left unprotected. It is shown that the Musalmans accept vaccination more freely than Hindus, and this is in accord with the general experience of the Department; but the city of Bombay forms a striking contrast to this almost universal rule.

9. One of the best signs of progress in this report is the fact of there having been 294,841 infantile vaccinations, which is an increase of 55,098 over the preceding year. Since the re-organization of 1871 these have increased by one hundred thousand, and in this report they stand at 43·9 per cent. on the total number of persons operated on. This is a very high percentage for itinerant vaccinators to reach. I note that the infantile vaccinations are again highest in the Presidency Circle and lowest in the Southern Circle of all British Circles; but I am pleased to see that the Southern Circle, though still the lowest, is 6 per cent. higher than in the last report.

10. There were 635,254 primary vaccinations, and in them the successful was 96·4 per cent., which is 1·6 higher than in the preceding year. It was highest in Sindh, and lowest in the Presidency Circle of all British Circles; but the lowest is only 3·2 less than the highest. This is considered a very satisfactory rate of success for an itinerating establishment, such as ours is, to reach. The re-vaccinations numbered 60,807 ; of these 48,504 were in the Sindh Circle, and of the total 45,618 were successful, or a percentage of 80·8. This is 15·1 higher than in the previous year. The percentage in the army returns, however, was 44·6, and ~~it is considered that~~ the army rate is probably, the Superintendent General considers, the most correctly noted.

11. On our population of over twenty-five millions, as shown by the census, Dr. Pinkerton calculates that, with a birth-rate of fully 40 per mille, there might be about 850,000 persons primarily vaccinated per annum, after writing off 18 per cent. of the births for still-born, deaths, those having small-pox and those escaping the vaccinators. On this calculation, the Department vaccinated eight-tenths of the available children last year. This must be viewed with much satisfaction, and I fully endorse the words of the

Superintendent General, that "nothing but the utmost devotion to their duty could obtain such a result" by the officers and vaccinators of the Department. There were 26·7 per mille of the population primarily vaccinated last year, but the Department should aim at 33 per mille if the birth-rate be as high as it has been computed to be by Surgeon-Major Lumsdaine in the Census Report. The rate of vaccinations per mille of population ranges from 39·1 in Sindh to 19·3 in the Presidency Circle. It is certain, however, that the birth-rate of a city like Bombay cannot be anything like 40 per mille; it is probably not over 25, stated by the Superintendent General in his report of last year: so that 19·3 in Bombay city is positively higher than 21·7 in the Southern Circle. On the whole returns it is shown that there were successfully vaccinated in British territory 26·9 per mille and in Native States 22·3.

12. The lymph degenerated for a short time in three Circles, viz., Eastern Gujarath, Western Gujarath, and Sindh, but was promptly renewed. The lymph which was received from England succeeded in five Circles, and was unsuccessful in two; sufficient was, however, obtained to multiply to any extent required. Animal vaccination was practised in Bombay, Poona and Barsi. The cow-lymph in Bombay was abundant and good, and the success resulting from its use was higher than in any previous year. This is of special use in Bombay, where of all places it has been found next to impossible to induce parents to bring their children to give lymph for further vaccinations.

13. The expenditure from all sources was Rs. 2,20,663, of which Government contributed about half. This is an increase of Rs. 4,580 over 1873-74. Government contributed of this increase about one-half, and the other half was provided by Native States, local and municipal funds. The cost of each successful case was 5 annas and 4 pies, or 10 pies less than in the preceding year. A memorandum is now before Government, in which Dr. Pinkerton shows how a portion of the vaccine expenditure ought to be debited to general sanitation.

14. The Superintendents and their Assistants inspected 47 per cent. of the persons operated on, without discovering any falsifications in the registers of the vaccinators in British territory; but I regret to observe that Dr. Blomfield, in Kathewad, discovered ten instances of this very serious offence, and Dr. Raby reports another in the Kolhapur State. The Superintendent General is of opinion that the practice is now very limited; it cannot escape the searching tests to which the registers are subjected.

15. It is to be regretted that vaccination is still so backward in Kutch, and that it is so costly. The supervision there and in Gaikawadi territory appears to be really *nil*, and I concur with the Superintendent General in thinking these Circles should be joined to the two Gujarath circles, and supervised by Drs. Cola and Blomfield.

16. Inoculation is reported to have been practised in 3 villages in Mahad taluka and in the Thar Parkar, but in both instances to a very small extent. As a matter of fact, the inoculator cannot compete with the vaccinator; still it is probable, as Dr. Pinkerton says, inoculation will not entirely cease until all the old inoculators are dead.

17. Dr. Williams brought to notice a "false vaccinator." A man went about in the Thar and Parkar pretending to vaccinate by making punctures, but had no lymph; the people paid him for the operation. This shows what a firm hold vaccination has on the people of Sindh. The man was prosecuted and convicted.

18. In regard to vaccino-syphilis, the Superintendent General says not a single instance has yet come to light of syphilis having been communicated by vaccination to any person in this Presidency, notwithstanding every effort on the part of the officers of the Department to discover any such case; and their experience in this matter extends to over a million and a quarter of observations.

19. The Superintendent General's tour was an extensive one, including Sindh, the Dekkan and Konkan; the only part not visited was Gujarath.

20. The tours of Superintendents appear to have been extensive and judiciously arranged. I observe, however, that Palanpur districts had not been visited by the Superintendent of the Western Gujarath Circle in the last two years. Dr. Blomfield says he found so much to do in Kathewad itself, that he could not find time. I am of opinion that this district ought to have a Native Assistant Superintendent who should be paid by the Chiefs.

21. As regards small-pox, the year 1874-5 was a non-epidemic one, and the recorded deaths stand at 3,903 only, and of these it is known that some were incorrectly returned as having died of small-pox, when in reality many died of measles and other diseases. The deaths in the two preceding years were 9,946 and 26,699. If the returns are not quite correct, still they show this disease to be much less last year than in the two preceding it. I am afraid the statistics of births and deaths in this Presidency are at present of very little value, though it is cheering to know they are improving.

If Government adopts Dr. Pinkerton's suggestion to give the village returns into the hands of the officers of the Vaccination Department for compilation as well as inspection, I feel sure that in a very few years fairly correct figures would be obtained of immensely more value than the very doubtful ones at present recorded.

22. The progress shown by districts is very interesting. Belgaum is still the backward zilha, but there an increase of 8 vaccinators will improve matters. It is very evident that in some of the larger talukas more than one vaccinator is required, and I am glad to see the Superintendent General is gradually obtaining and placing a second where necessary.

23. The work of the officers of the Department in the past year is in every respect highly satisfactory, and I have much pleasure in commending to the favourable notice of Government Drs. Williams and Cody, as named by the Superintendent General. Although I mention these names only, yet I most gladly put on record my entire satisfaction with the work in all British Circles in the past year. The conduct of the Assistant Superintendents and vaccinators has also been satisfactory. Each vaccinator on an average vaccinated 1,828 persons, or 176 more than in the preceding year, which, taken in conjunction with the higher rate of success and lower rate of cost, is very creditable, indeed, to the Department, so well and ably conducted by the Superintendent General, who I would beg specially to commend to the favourable notice of Government, as I fully believe, to produce such results as are here shown, the guiding hand must possess a great amount of tact to ensure the harmonious working of so large a Department in a manner so satisfactory.

I have the honour to be,

Sir,

Your most obedient Servant,

W. THOM, F.R.C.S.L.,

Surgeon General.

INDEX.

	Para.	Page.
Aid from civil and political officers...	69	34
„ of a peon to help dispensary officers in vaccination ...	53	27
Ages, percentages of	20	10
Animal vaccination	34	19
Army, decrease in	11	6
„ number of primary vaccinations in	12	6
„ „ re-vaccinations in	14	7
„ percentage of infantile vaccinations in	22	11
„ „ sexes in	18	8
„ „ success in primary and re-vaccinations in...	26	12
„ rate per mille of population protected in	30	15
Assistant superintendents, conduct of	45	23
„ „ number of, by circles	3	2
Average number of operations by each vaccinator	60	28
„ „ „ „ „ by circles ...	61	28
„ „ „ „ „ by establishments ...	60	28
Bombay Presidency, area and population of, by census ...	3	2
„ „ total operations in	8	5
„ System of vaccination described	4	3
Castes, percentages of	19	8
Circle, Baroda, progress in	128	54
„ Central, „ „	77	40
„ „ small-pox in	70	35
„ „ tour of the superintendent of	67	32
„ Eastern Gujarath, progress in	104	47
„ „ „ small-pox in	70	35
„ „ „ tour of the superintendent of ...	68	32
„ Kutch, progress in	130	55
„ „ small-pox in	70	37
„ Presidency, progress in	76	39
„ „ small-pox in	70	37
„ Southern, progress in	84	42
„ „ small-pox in	70	35
„ „ tour of the superintendent of	68	32
„ Sindh, a false vaccinator in	65	31
„ „ progress in	121	52
„ „ small-pox in	70	36
„ „ tour of the superintendent of	68	34
„ Western, progress in	94	45
„ „ small-pox in	64	30
„ „ tour of the superintendent of	68	32
„ Western Gujarath, progress in	117	51
„ „ „ small-pox in	70	36
„ „ „ tour of the superintendent of ...	68	32
Circles, average number of operations to each vaccinator by ...	61	28
„ constitution of	2	1
„ cost of each successful case, excluding superintendents' pay by	38	20

	Para.	Page.
Circles, inspections of superintendents by	39	21
,, ,, ,, by calling out registers by	40	22
,, lymph in use, conditions of, by	31	15
,, ,, English, result of the use of, by	32	17
,, number of assistant superintendents, clerks, peons, superintendents, and vaccinators, by ...	3	2
,, operations compared with the preceding year by ...	47	24
,, ,, of dispensary officers, increase and decrease in, by ...	52	27
,, ,, of Local Fund vaccinators ,, by ...	50	25
,, ,, of Municipal ,, ,, by ...	49	24
,, ,, of Native States ,, ,, by ..	51	26
,, percentages of sexes by	18	8
,, ,, of infantile vaccinations by	22	11
,, ,, of success in primary and re-vaccinations by...	26	12
,, population, census, by	3	2
,, ,, rate per mille of, protected by	30	15
,, re-vaccinations by	14	7
,, successful primary operations, by	30	15
Clerks, number of, by Circles	3	2
Collectorate of Ahmadabad, progress in	118	52
,, Ahmadnagar, ,, ...	79	41
,, Belgaum, ,, ...	85	43
,, Bombay, ,, ...	76	39
,, Broach, ,, ...	107	48
,, Dharwad, ,, ...	86	43
,, Hairabad, ,, ...	123	53
,, Kaladgi, ,, ...	87	43
,, Kanada, ,, ...	88	44
,, Karachi, ,, ...	122	53
,, Khandesh, ,, ...	98	46
,, Kheda, ,, ...	105	48
,, Kolaba, ,, ...	96	46
,, Nasik, ,, ...	97	46
,, Panch Mahals, ,, ...	106	48
,, Poona, ,, ...	78	40
,, Ratnagiri, ,, ...	82	42
,, Satara, ,, ...	81	41
,, Shikarpur, ,, ...	124	53
,, Sholapur, ,, ...	80	41
,, Surat, ,, ...	108	48
,, Thana, ,, ...	95	45
,, Thar and Parkar,, ...	125	53
,, Upper Sindh Frontier, progress in	126	54
Civil life, operations in	8	5
Commendation of superintendents	42	23
Conduct of assistant superintendents	45	23
,, vaccinators	62	29
Cost total	37	19
,, of each successful case, excluding superintendents' pay ...	38	20
,, ,, ,, ,, including all charges	38	21
Deaths from small-pox	70	35
Department, strength of	3	1

	Para.	Page.
Dispensaries, aid of a peon in carrying on vaccinations in ...	53	27
,, inspection of	73	39
,, number of primary and re-vaccinations in ...	8	5
,, percentage of infantile vaccinations in ...	22	11
,, percentages of sexes in	18	8
,, ,, of success in primary and re-vaccinations in	26	8
,, vaccinations in, by circles	52	26
Excess of operations over persons primarily vaccinated ...	13	6
,, ,, ,, re-vaccinated ...	14	6
Government establishment, operations by	48	24
,, ,, ,, average number of ...	48	24
,, ,, percentages of success in primary and re-vaccinations by ...	27	13
Infantile vaccinations, progress of	20 & 22	10
,, ,, percentages of, by circles	22	11
Inoculation with small-pox virus	64	30
Inspection of dispensaries	73	39
,, of superintendents	39	21
Inspections 47 per cent. of total operations	44	23
Introduction	1	1
Itinerant establishment, number of primary and re-vaccinations by.	8	5
Local Fund establishment, cost of each successful case in ...	50	26
,, ,, ,, operations by	50	25
,, ,, ,, ,, average number of ...	50	25
,, ,, ,, percentages of success in primary and re-vaccinations by	27	13
Lymph, cow, from Belgium	35	19
,, English, use of	32	17
,, in use, condition of	31	15
Maps supplied to vaccinators	72	39
Methods testing the correctness of the returns	40	22
Municipal establishment, cost of each successful case in ...	49	25
,, ,, operations by...	49	24
,, ,, ,, average number of ...	49	25
,, ,, percentages ofsuccess in primary and re-vaccinations by	27	13
Native State of Akalkot, area and population of	83	42
,, ,, Atpadi ,, ,, ...	83	42
,, ,, Bansda, progress in	114	49
,, ,, Bhor, area and population of	83	42
,, ,, Cambay, progress in	112	49
,, ,, Dharmpur, ,, ,, ...	113	49
,, ,, Janjira, ,, ,, ...	102	47
,, ,, Jat, area and population of	83	42
,, ,, Jawar, progress in	101	47
,, ,, Khairpur, ,, ,, ...	127	54
,, ,, Penth, ,, ,, ...	103	47
,, ,, Phaltan, area and population of	83	42
,, ,, Sachin, progress in	115	49
,, ,, Sawantwadi ,, ,, ...	92	45
Native States establishment, cost of each successful case in ...	51	26
,, ,, ,, operations by	51	26

	Para.	Page.
Native States establishment, operations, average number of ...	51	26
,, ,, ,, percentages of success in primary and re-vaccinations by ...	27	13
,, ,, of Central Circle, progress in	83	42
,, ,, of Dangs, vaccinations not introduced in ...	99	46
,, ,, ,, method of introducing vaccinations in..	100	47
,, ,, of Eastern Gujarath Circle	109	48
,, ,, of Kathewad, progress in	119	52
,, ,, of Kolhapur, ,, ,, ...	90	44
,, ,, of Mahi Kantha, ,, ,, ...	110 & 116	48 & 50
,, ,, of Palanpur, ,, ,, ...	116 & 120	50 & 52
,, ,, of Rewa Kantha, ,, ,, ...	111 & 116	49 & 50
,, ,, of Southern Maratha Country, progress in ...	91	44
,, ,, of Western Circle	99	46
Obstacles to the spread of vaccination	71	38
Operations by circles	47	24
,, dispensary officers	52	26
,, Government vaccinators	48	24
,, Local Funds ,, ...	50	25
,, Municipal ,, ...	49	24
,, Native States ,, ...	51	26
,, in excess of persons primarily vaccinated ...	13	6
,, ,, ,, re-vaccinated	14	6
Peons, number of, by circles	3	2
Population of the Bombay Presidency according to census ...	29	13
,, computed number of children available for vaccination.	29	13 & 14
,, rate per mille of, protected	30	14
Primary vaccinations, number of	12	6
Rate per mille of population protected	30	14
Re-vaccinations, number of...	14	6
Sexes, percentages of	16	7
,, ,, compared with census	17	7
Strength of the department	3	1
Success in primary vaccinations	24	11
,, re-vaccinations	25	11
Superintendents appointed health officers	131	55
,, commendation of	42	23
,, number of, by circles	3	2
Superintendent general, tour of	67	31
Tour of superintendents	68	32
,, of superintendent general	67	31
Vaccinators, conduct of	62	29
,, number of, by circles and establishments ...	3	2
Vaccino-syphilis	66	31

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SINDH

FOR THE YEAR 1874-75.

Introductory remarks.

This is the seventh annual report by the Superintendent General of Vaccination. It is somewhat different from former ones, as Government have issued orders not to print the circle superintendents' reports, but to embody the substance of them in this one. This report will show : 1st, a general view of the working of the department as a whole ; 2nd, the progress of vaccination in each district ; and 3rd, the tables of figures, showing the number of vaccinations, cost, &c.

Constitution of circles.

2. There was no change in the constitution of the circles during the year, and they remain as described in last year's report at page ii ; but it has recently been recommended that the circles of vaccination be made uniform with the sanitary registration divisions, which, if sanctioned by Government, will be convenient for working, and also for making comparisons between the progress of vaccination and the number of deaths from small-pox, &c. I may here notice that Her Majesty's Secretary of State has sanctioned the creation of a superintendent of vaccination for the Western Gujarath circle, and a transfer of Rs. 7,000 from Imperial to Provincial Service has been made for this purpose ; hitherto the civil surgeon of Rájkot has also been superintendent of vaccination, but the two appointments can now be separated.

Strength of the department.

3. The following table shows the strength of the department, by circles, as it existed at the close of the year, and as compared with the preceding year. The population and areas are taken from the Census report of 1872. The railway population of 8,750 is omitted, as I cannot allot it by circles :—

Number.	Circles.	Area in square miles.	Population.	1874-75																1873-74.																
				Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Number of Vaccinators.						Number of Peons.					Total Strength.	Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Number of Vaccinators.						Number of Peons.					Total Strength.
								Government.		Municipal.	Local Funds.	Native States.	Total.	Government.	Municipal.	Local Funds.	Native States.	Total.						Government.		Municipal.	Local Funds.	Native States.	Total.						
								Civil.	Military.															Civil.	Military.										
1	Presidency	19	644,405	1	1	...	2	...	..	16	...	..	16	4	5	..	..	9	29	1	1	...	2	...	...	11	...	...	11	4	11	...	..	15	30
2	Central	27,516	4,823,947	...	1	6	2	..	..	9	48	6	63	10	9	48	6	73	144	...	1	5	2	..	...	12	48	5	65	9	11	48	5	73	146
3	Southern	25,569	4,762,457	...	1	5	2	...	...	8	38	26	72	8	7	38	29	82	162	...	1	5	2	...	...	6	37	25	68	8	3	37	25	73	149
	Western	28,361	3,109,370	...	1	5	2	..	..	4	42	4	50	9	3	42	1	55	113	...	1	5	2	...	...	4	42	3	49	9	3	42	1	55	112
5	Eastern Gujarath ..	15,939	3,147,853	...	1	4	2	...	...	3	25	18	46	8	3	25	15	51	104	...	1	4	2	...	...	3	25	18	46	8	3	25	15	51	104
6	Western Gujarath ..	30,224	3,644,852	...	1	3	2	2	..	5	7	39	53	9	5	7	39	60	119	...	1	3	2	2	...	5	7	38	52	9	5	7	38	59	117
7	Sindh	49,306	2,322,765	...	1	6	2	...	...	5	43	2	50	10	3	43	2	58	117	...	1	6	2	...	...	5	43	2	50	10	3	43	2	58	117
8	Baroda	4,399	2,000,225	...	1	1	1	...	...	..	...	23	23	..	..	...	25	25	51	...	1	1	1	...	...	...	...	23	23	..	..	...	25	25	51
9	Kutch	6,500	487,305	...	1	1	...	..	...	..	..	11	11	...	..	..	6	6	19	...	1	1	...	...	...	...	...	11	11	...	...	...	9	9	22
	Aden	11	19,289	...	...	..	...	..	...	1	...	..	1	..	..	..	..	...	1	...	..	...	...	...	...	2	...	...	2	...	2	...	...	2	4
	Military Stations ..	....	115,100	...	...	...	..	...	4	..	...	...	4	...	...	..	..	...	4	...	...	...	...	...	4	...	...	...	4	...	...	...	...	...	4
	Total ..	1,87,844	25,077,568*	1	9	31	15	2	4	51	203	129	389	58	35	203	123	419	864	1	9	30	15	2	4	48	202	125	381	57	41	202	120	420	856

* Exclusive of Railways, which amount to 8,750 souls.

4. There has been no change made in our system of working, and the principles laid down by Government have been strictly adhered to. The "Bombay System of Vaccination" may be described in very few words:—

Bombay system of vaccination.

1st. This presidency is divided into nine circles, in each of which there is a superintendent who controls and directs the working of his vaccinators and assistants, and also tests the work of both as regards quality and quantity. The superintendent is usually a commissioned medical officer, but not necessarily so. At present three of the nine are graduates of the Grant Medical College, and are not commissioned officers. Two of the nine are paid by the native states of Baroda and Kutch; the other seven are paid by Government. One of the seven could, I think, be saved,—I mean the superintendent of the Presidency circle. During fully six months of the year I have held charge of the Central circle in addition to my own duties. I think this arrangement should be made a permanent one, as it will save fully Rs. 11,000 a year, without in the very least injuring the efficiency of the department. This subject is before Government in a separate paper.

2nd. In each collectorate there is an assistant superintendent, and in two of the largest there are two; there are also three employed in the native states of Kolhapur, Baroda and Kutch, and they are paid by these states; the other 28 are paid by Government. They are constantly looking after the working of the vaccinators to see that the lymph is good, that the vaccinators work steadily from village to village, and behave themselves properly; and whenever there is any difficulty, the assistant superintendent goes to the place where it is, and, if possible, removes it.

3rd. In each taluka, with one or two exceptions, there is at least one peregrinating vaccinator, and in a few of the largest ones there are 2. We still require a second to be appointed in several of the larger talukas, and this we are gradually getting done. Now, that we have correct figures regarding population, our wants can, in this respect, be more definitely ascertained. These vaccinators are paid in British territory by local funds, and in native states territory by the states in which they are employed. They usually vaccinate 3 days a week, and the other days are occupied in ascertaining the results of previous vaccinations, and in going to the villages where vaccination is to be practised next week, to inform the people of their coming, so that all the children may be ready and present. When going regularly from village to village the work is mostly done from arm to arm. A vaccinifer is taken from one village to the next one. When lymph has to be carried to a distant village, it is so in tubes. The first series of vaccinations from tube-lymph always show a number of unsuccessful, and if it were not for this, our vaccinators would obtain nearly 99 per cent. of success.

4th. Besides the above peregrinating vaccinators, there are 51 stationary in our large towns, and they are all paid by the towns which employ them.

5th. Again, six vaccinators are paid by Government: of these, 2 are civil, and 4 military.

6th. Each peregrinating vaccinator has a peon in British territory, and nearly all municipal and native states' vaccinators have also peons. The peon is a guarantee to the people that the vaccinator is a state servant. Without the aid of the peon, the vaccinator and the village patel or headman would be unable to collect the children to be vaccinated, and to be inspected

on the eighth day after having been vaccinated. The peons add considerably to the cost of our system; although at present I do not see how we could do without them, still I think it may be reasonably expected that at some future time the vaccinator will be able to work without a peon.

7th. Over the whole department there is the Superintendent General, who is under the control of the Surgeon General of the Indian Medical Department.

5. This "Bombay System of Vaccination", as reorganized in 1871, is, as far as I can see, perfect in theory, and in its application it has realized my best and highest hopes—that it will soon reach its utmost limits of extension, may safely be affirmed; and then vaccination will be within easy reach of all, even of those who live in the remotest wilds of Western India. But however good our system is, still I do not think small-pox can be completely stamped-out under it or even under any more perfect *voluntary* system. Yet I do hope and expect that the unprotected residuum will soon be so small and so scattered over an area of close on two hundred thousand square miles, that small-pox will never again be able to sweep over the plains of the Dekhan, destroying its tens of thousands. Of all our provinces Sindh was formerly the most afflicted by small-pox; so dire was the disease that almost all the people protected themselves by practising small-pox inoculation. Now the disease is less felt there than anywhere, notwithstanding the intercourse with the unvaccinated peoples on its boundaries who constantly carry the disease into Sindh. In our coast districts small-pox is never absent, and yet how few are the deaths! In Gujarath small-pox has existed throughout the year, and yet the deaths were only 861. These results bid me hope that small-pox, as a devastating epidemic disease, is within our power; but small-pox, in its endemic form, is not and never can be entirely under any voluntary system.

Increases and decreases in the number of vaccinators.

6. The number of Government vaccinators remain at 6, of whom 4 are military and 2 civil. The latter are employed, as stated in last report, in Rájkot and Dísá; and the former in the cantonments of Poona, Mhow, Nimach and Nasirábád: all the rest are paid by municipal, local and native states' funds. At the close of the year, there were 6 Government, 51 municipal, 203 local funds, and 129 native states' vaccinators, and the total number was 389, being an increase of 8 over the preceding year. There was an increase of 5 municipal vaccinators in Bombay city, and one was employed during the whole year in Dhárwád town, and another was at work in the towns of Gúlatgad and Kerúr during the last two months only of the year: these two towns have joined to keep up a vaccinator on Rs. 12, and a peon on Rs. 6 per mensem: one was appointed to Kárwár, but was abolished within the year, and one was appointed for Rohri—total increases 9. The reductions were of the vaccinators of Wálwá, Karhád, and Aden on the 31st March 1874; one of the vaccinators in Karáchi town was abolished in October, and the junior vaccinator was reduced in December last; and if we include the Karwar vaccinator, the total reductions are 6—thus leaving a net increase of 3 municipal vaccinators. There is one more local fund vaccinator who was appointed for the pethá of Mundegod in Kánadá. In native states there has been an increase of 4 vaccinators: 1 in Bhor, 1 in Sángli for Shapur and Dodwád pethás, 1 in Janjirá and 1 in Káthewád for the Gondal state, which was found to be too large for one vaccinator. In Rewa Kantha a vaccinator was reduced in Lúnwada, and a second appointed in Chota

Udaipur: the former at the end of the year, and the latter at the beginning of the year 1875-76. Besides the increases which took place during the year under report, I have to notice a further increase at the commencement of the year 1875-76 of 3 local fund vaccinators in Belgáum collectorate: 1 in Násik for the new táluká of Kulwan, and a second vaccinator for the very large táluká of Dhanduká in Ahmadábád zilhá.

Work of the year is the largest ever attained.

7. The past year's work shows not only the largest amount of work ever done in a year, but also the largest increase that has ever been obtained in any one year. It gives me much pleasure to be able to say that the increase is distributed over the whole country, though, as might be expected, the actual rate of increase differs a good deal in the different circles; but there is a very considerable increase of work where it was most desired—I mean in the Southern and Presidency circles.

Number vaccinated.

8. The total number of persons vaccinated and re-vaccinated was 732,624, which gives an increase of 80,401 over the preceding year. The following figures show the work of the year as compared with the preceding one; and I trust they will be accepted as evidence of the superintendents, assistant superintendents, and vaccinators having endeavoured to do their duty well:—

1874-75.			1873-74.	
Primary Vaccinations.	Re-vaccinations.	In Civil Life.	Primary Vaccinations.	Re-vaccinations.
646,574	57,578	Itinerant Establishment.	600,471	22,409
19,393	1,799	Dispensary Establishment.	18,560	1,429
665,967	59,377		619,031	23,838
725,344		Civil Life Total.	642,869	
7,280		Army Total.	9,354	
732,624		Total Vaccinations in Bombay Presidency.	652,223	

There have been increases in the Itinerant Establishment of	81,272	and
at Dispensaries	1,203	
	82,475	
There has been a decrease in the Army of	2,074	
Total Increase ...	80,401	

Cause of decrease in Army.

9. I am unable to say positively the cause of this decrease in the Army, but judging from the monthly small returns of "unprotected," I hazard the opinion that it is owing to the want of subjects.

Causes of increases.

10. The chief increase is in the work of the local fund vaccinators, and it is mainly owing to the constant supervision exercised by the assistant superintendents and to the

zealous way in which the superintendents themselves have carried on their duty. The increased number of vaccinators (8) has helped only a very little to swell the increase. I here show the increase in the number of vaccinations, as compared with the previous year, in each establishment :—

203	Vaccinators	... Local Fund	59,605
129	„	... Native States	20,325
51	„	... Municipal	884
2	„	... Government	458
		Dispensaries	1,203
		Total increase	82,475

Decrease in Army.

11. Only in the Army has there been any decrease; but a decrease of 2,074 is very considerable when the total number is only 7,280. The 4 military vaccinators have done 2,371 vaccinations in cantonments, which is just about the same number as in the previous year. There is a decrease in the European Army of 394 and in the Native army of 1,680. I must mention that the 4 military vaccinators vaccinated many more than the 2,371, but the others were entered in the regimental returns of their stations. The decrease, as above mentioned, appears to be due to want of subjects.

Number of primary vaccinations.

12. The number of persons primarily vaccinated was 671,089, exclusive of the British Army returns, which make no distinction between primary and re-vaccinations; but I apprehend that nearly the whole of the 728 in the returns of the European Army were primary; I shall therefore consider the total primary vaccinations as amounting to 671,817, thus :—

Itinerant Establishment ...	646,574
Dispensary do. ...	19,393
British Army ...	728
Native do. ...	5,122
Total primary vaccinations.	671,817

Excess of operations over persons in primary vaccinations.

13. Of these primarily vaccinated persons, 5,612 were operated on more than once, having been unsuccessful on the first operation; but this is a very small portion of the whole of the unsuccessful cases, which numbered 23,344. It is to be regretted that so few of the unsuccessful are again submitted to the operation, and this circumstance emphatically points out to us how necessary it is for the vaccinators to operate so carefully as always to insure the highest possible success by the first operation, because many mothers willingly submit their children to one operation who refuse to do so again if it fail.

Number of re-vaccinations.

14. The re-vaccinations numbered 60,807, of whom 375 were twice operated on, the first operation having failed. The most of the re-vaccinations were in the Sindh circle, but the following figures show how they were spread over all the circles :—

Sindh	...	48,504
Southern	...	2,810
Western Gujarath	...	2,614
Eastern do.	...	1,759
Presidency	...	1,562
Native Army	...	1,430
Central	...	942
Western	...	933
Baroda	...	173
Aden	...	67
Kutch	...	9
Muscat	...	4
Total re-vaccinations...		60,807

There has been no attempt made to push re-vaccination, except perhaps in Sindh, because in most of the other circles the vaccinators have found quite enough to do to carry out primary vaccination; but I think a little more attention must now be given to this subject.

Percentages.

15. The percentages of sex, caste, age and result can be shown for primary vaccinations in all establishments except the British Army, but for re-vaccinations the percentage can only be shown for the result of the operations.

Sex.

16. There are only two columns for entering the sexes, and they show the sexes *at all ages* only—and not for the sexes at particular ages. There were, exclusive of the British Army, 352,214 males and 318,875 females—an excess of 33,339 males. So in every 100 vaccinated persons there were 52·48 males and 47·52 females. The census shows for the whole population at all ages 52·38 and 47·62; so there is exactly one-tenth per cent. more males and one-tenth per cent. fewer females in the vaccination returns than in the census. But if we take the percentages of the sexes in the first year of life from the census report, and compare them with the vaccination returns, the difference is greater, which is owing to the larger number of the vaccinated children being above one year old at the time they were vaccinated. Thus, the males in the census predominate by only ·98 in every 100 persons in the first year of life, whereas between 1 and 6 years the excess of males is 2·02. The excess of males for all ages in the vaccination returns is 4·96, or double the difference in the first six years of life as shown by the census and less than half the difference between the ages of 6 and 12. But what is singular is that in the year 1874* the births show males 52·96 and females 47·04, or an excess of males of 5·92, which is a very different rate from the census. The inferences are, *first* that either the vaccination returns or the census figures are not quite correct; or, *second*, that a very considerable portion of the 376,248 who were above one year old when vaccinated were really over six years old.

Sexes percentages as compared with census.

17. I show the percentages of the sexes as compared with the census figures and the birth-returns for the year 1874:—

* I am indebted to the courtesy of Mr. Lumsdaine for this information, he having kindly lent me the proofs of his report for 1874 for a day.

	Males.	Females.
Census 1—6 years ...	51·01	48·99
Vaccination returns—all ages ...	52·48	47·52
Census—all ages ...	52·38	47·62
Birth registers for 1874 ...	52·96	47·04

This small disparity is very satisfactory as compared with former years, as it shows that we now get the children vaccinated at an earlier age. In 1866 the excess of males was 10, in 1873-74 it was 5·6, and now it is 4·96 in every 100 persons.

Percentages of sexes in circles and disparity.

18. The percentages of the sexes are here shown by circles :—

	Males.	Females.	Excess of Males.
Sindh	56·97	43·03	13·94
Presidency	55·32	44·68	10·64
Baroda	54·25	45·75	8·50
Eastern Gujarath	52·15	47·85	4·30
Southern	51·90	48·10	3·80
Western Gujarath	51·78	48·22	3·56
Kutch	51·17	48·83	2·34
Central	50·93	49·07	1·86
Army	54·78	45·22	9·56
Dispensaries	53·07	46·93	6·14
Aden	78·73	21·27	57·46

The disparity is very great in the Sindh circle—no less than 13·94; in Aden the difference is simply absurd. I cannot believe that these two excessive disparities can represent the disparity of the sexes in either Sindh or Aden, and I believe that a little more care, on the part of the vaccinators there in entering the sexes in the registers, would show the disparity of the sexes in those vaccinated, to be very much less than is here set down.

Castes.

19. In the vaccination returns there are columns for 1st Christians, 2nd Hindus, 3rd Musalmans, 4th Parsis and 5th other castes. Exclusive of the British Army, the vaccinated were by castes :—

Christians	3,323
Hindus	505,150
Musalmans	113,407
Parsis	1,216
Other Castes	47,993
Total ...	671,089

This gives a percentage of 0·49 for Christians, 75·27 for Hindus, 16·89

for Musalmans, 0·18 for Parsis, and 7·15 for all Other Castes combined. Arranged in the way shown by the census this would give :—

Hindus	...	75·28
Musalmans	...	16·90
Other Castes	...	7·82
		100

The Census shows :—

Hindus	...	83·42
Musalmans	...	15·21
Other Castes	...	1·37
		100

It is evident from this that in the vaccination returns there is a larger number included under the heading " Other Castes " than in the census report. These figures show however that the Musalmans generally accept vaccination more freely than Hindus ; and this quite accords with the general experience of the department, except in Bombay city, where the proportion of Musalmans vaccinated to Hindus is below the proportion they bear to each other in the census ; and it is remarkable that the Mahomedan community of Bombay have always been backward in accepting vaccination. Why it should be so, I am at a loss to say. The Mahomedans of Bombay city are certainly as intelligent as any of their religious *confreres* in any other part of the presidency, and they do not object to vaccination on either the score of religion or custom. I can only guess that they are careless of life, and, being a busy people, do not give time or thought to guard against a probable danger. I will now show the percentages of the castes and the difference as compared with the census :—

Percentages of Castes.

Castes.	By census.	By vaccination returns.	Difference.
Hindus	83·42	75·28	— 8·14
Musalmans	15·21	16·90	+ 1·69
Other Castes	1·37	7·82	+ 6·45

I infer from these figures that in the vaccination returns a number of Hindus are entered in the column for " Other Castes." This is not to be wondered at considering that the vaccinators have been educated to consider all Dheds, Mangs, Chambars and Shikaris in the Thar Parkar as outcastes, and that they should be entered in the column for " Other Castes." This could be altered so as to make our returns more in uniformity with the census ; but if so, there would be some danger of the low caste Hindus being passed over by fastidious vaccinators, so for vaccination purposes our classification is better than the census one.

Ages.

20. There are two columns in the vaccination returns to enter the ages of those who are vaccinated. The 1st column is for all "under 1 year old" and the 2nd column for all "above 1 year old". Exclusive of the British Army returns there were 294,841 under one year old and 376,248 above that age. This gives an increase of 55,098 infantile vaccinations over the preceding year and an increase of 219,686 as compared with the year 1857. The following figures,

Progress of infantile vaccination.

taken from previous annual reports, but corrected to show the number also vaccinated under 1 year old at dispensaries and in the Native Army, show how infantile vaccination has progressed in the past 18 years :—

Years.	Infantile vaccinations.	Percentages.
1857	75,155	30·4
1868	177,276	41·1
1869-70	191,221	41·8
1870-71	169,072	34·5
1871-72	183,397	34·8
1872-73	209,395	36·8
1873-74	239,743	38·3
1874-75	294,841	43·9

I cannot get any very accurate figures on this subject previous to 1857. I consider the percentage of 43·9 shown for the year under report is quite as high as we can reasonably expect a peregrinating establishment to reach. It is the highest that has yet been recorded, and is fully higher than I anticipated. I am not sure that I can absolutely guarantee the correctness of the ages recorded, but no errors of any consequence have been noticed either by myself or the superintendents when testing the vaccinators' registers; and so far this speaks strongly for the general correctness of the ages, because superintendents tested 69,576 names in the registers and their assistants tested 325,430. Still it is probable that the age columns are not so carefully tested as the result ones, because they are much less important. I consider this increase in infantile vaccinations most satisfactory.

Infantile vaccination by circles.

21. It is interesting to show the percentages of infantile vaccinations by circles as it shows, in a strong light, the progress of vaccination made in each: although it must be remembered that it is easier to obtain a high percentage in the Presidency circle than in the others, because of there being a large population in a small area.

Infantile vaccinations.

22. The following shows the percentage of infantile vaccinations in the year 1874-75 on the total number of vaccinations :—

In the	Native Army	...	83·9
„	Presidency Circle	...	66·4
„	Dispensaries	...	52·3
„	Western Gujárath Circle.		50·5
„	Eastern do.	...	47·8
„	Western Circle	...	45·4
„	Central do.	...	44·1
„	Baroda do.	...	43·1
„	Sindh do.	...	39·8
„	Southern do.	...	31·0
„	Kutch do.	...	21·4
„	Aden do.	...	14·9

Of the circles, the Presidency again stands highest, and in British territory the Southern again the lowest; but even the lowest presents a very fair figure, and it is 6 per cent. higher than in the preceding year. Dr. Raby deserves some credit for this improvement, which I have much pleasure in noticing. His circle is still, however, a good way behind the others, except Kutch, which is very backward; and what appears to me somewhat singular is that the station vaccinator of Aden has only 14·9 per cent. of infantile vaccinations. The Army infantile vaccinations are by far the highest, because the parents of all the children born in regiments and cantonments are to some extent compelled to get their children vaccinated, and those who come into the lines to live, if not already protected by vaccination or small-pox, are at once vaccinated. This is not an absolute rule, but it is almost universally practised in the cantonments of this presidency with the result of keeping our regiments and cantonments very free of small-pox. It may be said that our cantonments are nearly thoroughly protected, and that our regiments are so.

Infantile vaccination in the Army and cantonments.

23. The returns show the results for primary vaccinations and re-vaccinations separately. There are three columns under each of these headings, viz., 1st, for successful, 2nd for unsuccessful and doubtful success, and 3rd, unknown, or those who are not seen after the operation and in which the result of it is not known to the vaccinators. In the British Army the successful cases only are given, so they are excluded from these remarks.

Results.

24. There were 635,254 successful primary vaccinations, 23,344 unsuccessful and doubtful, 18,103 unknown. In calculating the percentage of success the "unknown" is excluded, or rather, I ought to say, deducted from the total. We have then by this method a percentage on the remaining total of 96·4, or 1·6 higher than in the preceding year. This is satisfactory, but, as I said in my last report, the percentage of success under the best circumstances ought to be 99. It is very unlikely, however, that we can ever have our circumstances quite perfect with voluntary vaccination and a peregrinating establishment of vaccinators.

Result in primary vaccinations.

25. There were 45,618 successful re-vaccinations, 10,775 unsuccessful and doubtful, and 4,789 unknown. The percentage of success is 80·8 or 15·1 higher than in the preceding year. This is an unusually high percentage of success for re-vaccinations, and it suggests the idea that many primary vaccinations are entered in the re-vaccination

Result in re-vaccinations.

columns. I mentioned in my previous report that it is very difficult to define exactly what success is in re-vaccinations, and personally I do not think these figures are of any exact value as statistics. They are so far of value that they show a large number of persons have been protected who had only a very doubtful protection before submitting to the operation of the so-called re-vaccination. Experience may yet show that re-vaccinations are more successful than has been generally supposed—a good many of the earlier writers on this subject based their opinions on very limited numbers. At all events our knowledge now enables us to state that neither the most successful vaccination nor the severest attack of small-pox can be predicated as a sure protection against a future attack of small-pox. There were 651 persons re-vaccinated in Shikárpur, Karáchi, and Kaládgi Jails and in Her Majesty's 29th Regiment N.I. Of these, 284 only were successful, or 45·6 per cent. If the result has been noted by the medical officers themselves in each case, these figures are valuable. Dr. Williams makes some remarks with reference to the percentage of success, in the Sind circle, which I quote: "The percentage of "success in re-vaccinations is 85·5—somewhat higher than it was last year. "This is due to an attempt made to classify the results into 'good', 'mid-"dling' and 'bad'; so that many that would formerly have been classified as "unsuccessful come now under the 'bad' denomination. But I am not satisfied "with this classification for re-vaccinations. I think a better plan would be "to show on which day the areola formed, whether the 4th, 5th, 6th, 7th, or "8th day.

"There is so much diversity of opinion as to what constitutes a success-"ful re-vaccination that a resort to some arrangement of this kind appears to "be necessary to obtain results for comparison. An *unsuccessful* re-vaccina-"tion should mean nothing but a *failure*, due either to a bad operation, inert-"ness of the lymph, or absolute immunity enjoyed by the system against the "vaccine and variolous diseases. We see by every case of small-pox that there "are degrees of severity and we know that some persons enjoy immunity "from it. The degree of infective capacity seems to be shown by the earli-"ness of the appearance of the areola in cases of re-vaccination, and it would "seem to me more rational to register the date of the formation of the areola "and thus give us some idea of the amount of immunity enjoyed, than to "compel every case to be classified as successful or unsuccessful as though it "were a case of primary vaccination."

26. The following figures show the percentage of success by circles:—

	In Primary Vaccinations.		In re-vaccinations.	
Sindh	98·2		85·9	
Central	97·2		59·4	
Eastern Gujarath ...	97·1		69·7	
Southern	96·9		59·7	
Western Gujarath ...	95·9		78·5	
Western	95·3	Average 96·4	57·5	Average 80·8
Presidency	95·0		54·0	
Kutch	93·9		33·3	
Baroda...	93·2		83·6	
Dispensaries	92·5		58·4	
Army	91·5		44·6	
Aden	85·8		83·6	

From these figures it will be observed that as regards primary vaccinations in circles, Sindh again has the highest success, and the Presidency and Western circles the lowest; but by circles the lowest is only 3·2 less than the highest. It is with much pleasure I note the improvement in the success here as compared with last year. The percentage of success in primary vaccinations is very satisfactory indeed, and as regards its general correctness there can hardly be any doubt, because a very large proportion of the vaccinated persons have been seen by the supervising officers of the department. As regards the success in re-vaccinations the Army is the lowest, except Kutch, where there were only a very few re-vaccinations altogether; and as the results are noted in the Army by qualified medical officers, they are much more reliable than the other figures.

27. It may be as well here to show also the resulting success of the operations as performed by the different establishments:—

			Primary Vaccinations.	Re-vaccinations.
1*st.*	2	Government civil vaccinators obtained	97·6	76·7
2*nd.*	51	Municipal do. do.	95·9	70·2
3*rd.*	203	Local Fund do. do.	97·0	84·2
4*th.*	129	Native States do. do.	95·9	73·9
5*th.*		In Dispensary returns	92·5	58·4
6*th.*		In Native Army	91·5	44·6

The low rate of success in the Army is probably due to there being so few vaccinations performed at a time, and consequently medical officers not being always able to choose a vaccinifer with perfect vesicles from which to vaccinate.

28. I have now shown the actual work of the department as a whole; I will now endeavour to show, by the light of the census, what the number of primary vaccinations per annum might be.

Population.

29. The population of this presidency is 25,086,318 as shown by the census, and the area is 187,757 square miles. The birth-rate in British territory as registered is about 17·7; but this is well-known to be too low, and Mr. Lumsdaine has computed it to be 40·96 per mille of population. If we take the computed rate and apply it to native states, as well as to British territory, it will give a total of births of 1,027,535 per annum in this presidency. Excluding still-born, this is theoretically the number that might be vaccinated, but to carry out the theory it is evident that every living child would require to be vaccinated as soon as born—practically such a thing cannot be done. But it will be interesting to try and find out how many children could be vaccinated annually. The vaccinators have each an average area of 487 square miles to go over, and speaking generally, it takes them two years to go over the population in their areas; or in other words, half the area and population of this presidency are gone over annually. I have asked Mr. Lumsdaine for the number of deaths in the first year of life, but he has not calculated it for the whole presidency on the census figures. I will, however, make an estimate based on known figures. Mr. Randle has drawn up a diagram of deaths, based on a parliamentary blue book of the session of 1873, for England and Wales, and it is shown to be on an average 18 per cent. in the first year of life. The

rate ranged from 7·9 to 30·5, the highest rate being in Liverpool district. Again, the English Life Table gives the death-rate

in the first year of life at	...	16·6 per cent.
from 2 to 5 years	....	2·6 „
„ 5 „ 10 „	...	1·0 „
„ 10 „ 15 „	...	0·5 „

Now, judging from my own knowledge of the conditions of life, both in England and Bombay Presidency, I feel sure that the average infant mortality here is even higher than in England, notwithstanding the higher rate in English cities as compared with the country districts. It is true that the mass of the population here live in country districts and are not subjected to the noxious evils of crowding; but to counterbalance this advantage there are many circumstances which must make the infantile death-rate here a very high one :—they are chiefly, 1st early marriages producing weakly infants ; 2nd, the people are not as well off as in England ; and 3rd, infant life is not so highly valued as it is in England ; and consequently there is not so much care taken of sickly children—I do not mean this in any reproachful sense, for no one knows better than I do, how an Indian mother loves her child; and 4th, want of medical aid—many a sickly child is saved in England by the doctor, who must die in India for want of, perhaps, a very simple remedy.

The available children may be calculated thus—the total births registered in 1874 in British territory were 287,670, and the deaths in the first year of life were 49,945, excluding from both sums still-births. This gives a rate of 17·3 per cent. of deaths in the first year of life in those born alive, or very nearly the same as Mr. Randle's diagram of deaths. From the Registrar General's thirty-second report for the births, deaths and marriages in England for 1869, I find that in the ten years 1860 to 1869, the deaths in the first year of life amounted to 15·28 per cent. of those born alive, and as the English birthrate is 35·1 and our computed rate is 40·96 the infantile death-rate here is probably at least 17·83. I think it will not be too much to deduct 18 per cent. from the total of computed births for, say, still-born, deaths, those who escape the vaccinator, and those who have small-pox before the vaccinator can reach them ; we have then a remainder of 850,000 in round numbers, which may be considered available for vaccination annually ; but this sum should be reduced a little for deaths in the second and higher years of life as we vaccinate at least up to 6 years old.

In my previous report I calculated that in a population of 24,500,000 we might primarily vaccinate 678,462 yearly, supposing the brith-rate to be 30 per mille ; but by the above method of calculating there should be, in a population of 25,086,318, somewhere about 850,000 children available for primary vaccination annually. This is about 170,000 more than were primarily vaccinated in the year under report. By this calculation there have been about eight-tenths of the available children vaccinated in the year 1874-75. Considering that vaccination is voluntary, this result must be considered very satisfactory and highly creditable to the vaccinators, assistant superintendents, and superintendents. Nothing but the utmost devotion to their duty could obtain such a result.

Rate per mille of population protected.

30. During the past year the primary vaccinations amounted to 26·7 per mille of population ; but if the birth-rate be 40·96 per mille, then we should aim at primarily vaccinating 33 per mille of population per annum. There were 25·3 per mille successfully vaccinated. The latter figures show the

actual protection afforded. I have again to notice that the protection varies very much in the different circles as shown below :—

Circles.	Total number of persons primarily vaccinated successfully.	Populations.	Number of primary successful vaccinations per 1,000 of population.
Native Army	4,846	100,571 *	48·1
Aden	785	19,289	40·6
Sindh	90,827	2,322,765	39·1
Western Gujarath	105,985	3,644,852	29·0
Eastern Gujarath	85,912	3,147,853	27·2
Central	124,276	4,823,947 †	25·5
Western	77,232	3,109,370	24·8
Southern	103,453	4,762,457	21·7
Presidency	12,482	644,405	19·3
Baroda	26,569	2,000,225	13·2
Kutch	2,792	487,305	5·7
	635,159	25,063,039 ‡	25·3

In British territory the successful vaccinations are 26·9 per mille of the population and 22·3 in native states.

Quality of lymph, vesicles and cicatrices.

31. The quality of the lymph is by far the most important subject in this report, and as the superintendents' reports are not to be printed, I will quote freely from theirs, so as to place on record, which can be easily referred to, the actual words, as far as possible, of the officers themselves of the different circles.

Lymph in Presidency circle.

1*st*.—In the Presidency circle, *i.e.*, Bombay city, the lymph is mostly obtained from calves. In December, January, and again in March the operations failed more or less in several animals, which so far crippled the establishment; all the rest of the year the supply has been abundant. Mr. Anantá Chandrobá says : "Animal vaccination continues satisfactory. 285 animals were inoculated with cow-lymph during the year; and, with the exception of 4 failures, all of which occurred during the latter part of March, they were very successful. Some 6 or 7 heifers did indeed sicken in the months of December and January, but the operations in them were successful."

Lymph in Central circle.

2*nd* In the Central circle I inspected the lymph in the collectorates of Poona, Sholápur, Sátárá and Ratnágiri, and in all I found it excellent. Generally the reports of the

* This population is very doubtful.

† Exclusive of the native state of Jat.

‡ Railway and British Army population is not given here.

assistant superintendents speak also the same language. The vesicles and cicatrices were good and perfect in type as a rule, exceptionally some cicatrices were seen to be less marked than desirable. The English lymph was successful and was distributed here and there.

Lymph in Southern circle.

3rd. In the Southern circle the lymph seen by Dr. Raby was excellent, "producing large and well-defined vesicles for the most part," and his assistants generally reported it good. English lymph succeeded and was distributed. Lymph deteriorated in Kolhápur and was replaced by English lymph.

Lymph in Western circle.

4th. In the Western circle Dr. Cody says :—"The lymph used was "from arm-to-arm, and was in an active state "throughout the year, as is shown by the success "attained, viz., 95·5." He further adds that had bad lymph existed anywhere he and his assistants must have seen it, as they tested nearly 60 per cent. of the entire work. The English lymph failed.

Lymph in Eastern Gujarath circle.

5th. In the Eastern Gujarath circle Dr. Cola says :—"During the "greater part of the year the lymph remained good "and active though the vesicles were not large, and "the resulting cicatrices are foveolated, but medium "in size. During the monsoon months the lymph of several vaccinators was "spoiled and great difficulty was experienced in replacing it. This deteriora- "tion is not peculiar to this circle but happens in other parts of Gujarath." A special report was called for on this deterioration of lymph in the Eastern Gujarath circle in the rainy season, and before submitting it Dr. Cola asked his assistants and vaccinators for their opinions. The causes alleged for the deterioration in the monsoon are : 1st, sudden changes of weather; 2nd, withdrawal of some of the larger towns from the vaccinators where there is a dispensary—the meaning of this is that in very rainy weather the vaccinators could keep up good lymph in such towns and without travelling out in the rain to the outlying villages previous to the time that dispensary officers were ordered to vaccinate in the towns in which their charges are ; 3rd, inability to work in time on a rainy day ; 4th, the flies break and injure the vesicles ; and 5th, unhealthiness of the monsoon season, especially as regards skin diseases. There can be no doubt about these circumstances existing, and they may fairly be considered deteriorating influences. But the first and second are common to the whole Presidency; the third is in the power of the vaccinators, and certainly should not be accepted as a good reason for allowing lymph to deteriorate ; the 4th cause may be more active in Gujárath than elsewhere, though I do not know positively that it is so. I am of opinion that with due precautions the vaccine virus may be maintained in all its pristine integrity in Gujarath at any season of the year provided the vaccinators take a little more care in the rainy season, which appears to be the only one in which there is a tendency for the lymph to go bad.

Lymph in Western Gujarath circle.

6th. In the Western Gujarath circle Dr. Blomfield says :—"The "lymph was reported bad in many districts at the "end of the rains, which ceased very suddenly, the "weather becoming unusually hot. The deterioration "is caused by the premature ripening of the vesicle, pus forming on the 5th or "6th day, the result being a superficial cicatrix. At the same season I have "found that surgical operations do so badly from suppuration and sloughing "that I avoid them as much as possible. English lymph was received from "the superintendent general in December and January and taking well "was distributed throughout the circle."

7th. In the Sindh circle Dr. Williams says :—" Speaking generally, the " lymph this year is decidedly inferior in quality. In " some places the lymph was excellent, the vesicles " well developed, and the cicatrix foveated. In " many others the lymph seemed purulent on the 6th or 7th day, the base of the " vesicle at the same time inflamed and leaving a perfectly superficial mark.

Lymph in the Sindh circle.

" I attribute this to two causes : 1st, the greater difficulty in obtaining " suitable vaccinifers, and 2nd, delay in having them conveyed to adjoining " villages so that the areola had become fully formed and the lymph purulent " before it could be used.

" The vaccinators and assistant superintendents are unquestionably to " blame for using lymph after the full development of areola ; they cannot be " persuaded to abandon such lymph when it has cost them much trouble to " have it conveyed perhaps a considerable distance. However I have this year " condemned the lymph in so many instances, and have inflicted such severe " punishment that I trust there will be much less bad work from this cause " in future. Two supplies were received from the superintendent general— " one in December 1874 and the other in January 1875 : both failed."

8th. In the Kutch circle " the lymph used during the year has acted " well for the most part." The English lymph succeeded.

Lymph in Kutch.

In Aden the lymph deteriorated in June, was renewed in July, was bad in August, September, October and November, and again renewed in December ; since then it has remained good.

Lymph in Aden.

On the whole it may be summed up that the lymph in general use was good for the greater part of the year in all circles, but that it deteriorated more or less in several in the rainy season. I consider the very most important duty of the superintendents and their assistants is to make sure that vaccinators never work with bad lymph ; so great an evil is it for a vaccinator to work with bad lymph, that it would be far better not to work at all. As we have by the weight of our position in a great measure thrust vaccination on the acceptance of the people, we are morally bound to give it of as good quality as possible ; and I can affirm from my own knowledge that there is not the very slightest necessity for a vaccinator, at any season of the year, working with deteriorated or bad lymph ; so I maintain that the quality of vaccinations should be good everywhere and in all seasons. Whenever the lymph deteriorates the vaccinator should cease working with it.

32. We received as usual two small supplies of English lymph in the months of December and January. It was issued to all circles, and the result of its use is exhibited in the table below. It will be observed that the first supply turned out successful in only three circles ; in three there was imperfect success, and in other three it failed entirely. The second supply gave the same sum of results, but differently in circles : so out of the two supplies success was obtained in five circles, imperfect success in two, and in the Western and Sindh circles the English lymph was entirely unsuccessful. In Baroda circle good vaccinations were established from the imperfect vesicles obtained from the English lymph ; so it may be said that it succeeded in six circles.

Supplies of English vaccine virus.

49 tubes of English lymph were used; 55 children were operated on; 282 insertions were made, and there resulted 34 good and 10 imperfect vesicles. The success cannot be considered as good as desirable; but it gave a supply of English lymph, which once started we could multiply to any extent required.

Whence received.	Vaccine circle in which tested.	Number of				Character of vesicles.	Remarks.
		Tubes tested.	Children operated on.	Insertions.	Resulting vesicles.		
England.	Presidency ...	2	1	5	4	Very Good	
	Central	3	4	16	5	Good	Failed in one child.
	Southern	3	3	16	...	Unsuccessful.	
	Western	3	4	22	...	Do.	
	Eastern Gujarath	3	3	14	2	Imperfect success.	Failed in one child.
	Western do. ...	3	3	12	3	Small.	
	Sindh	3	3	20	...	Unsuccessful.	
	Baroda	2	2	12	1	Small.	Subsequent vaccinations good. Failure in one child.
	Kutch	2	3	12	3	Good.	Failed in one child.
	Total...	24	26	129	18		
	Presidency ...	2	1	6	...	Unsuccessful.	Failed.
	Central	2	3	12	10	Good.	Lymph excellent.
	Southern	2	3	12	4	Do.	One tube only had good lymph.
	Western	3	4	18	...	Unsuccessful.	No sign of a vesicle.
	Eastern Gujarath...	3	3	14	1	Bad.	No lymph could be obtained.
	Western do. ...	4	5	30	8	Good.	Failed in 3 children.
	Sindh	3	4	31	...	Unsuccessful.	
	Baroda	3	3	18	1	Small.	Failed in 2 children, and subsequent vaccinations bad.
	Kutch	3	3	12	2	Do.	Failed in 1 child.
	Total...	25	29	153	26		
	Grand Total...	49	55	282	44		

33. Supplies of lymph were sent to Bassadore in the Persian Gulf, to Muscat in Arabia, to the Central Provinces, and in short to all applicants.

Animal vaccination.

34. The practice of inoculating calves with cow-lymph has been continued in Bombay throughout the year. It is much appreciated by the people, and by the abundant supply of good lymph which it gives it greatly facilitates the operations of the Presidency circle. The practice has also been continued in Poona under the health officer, but I have received no report from him for the past year. The practice has been introduced into Barsi town, and was practised for the greater part of the year. The municipality granted a small sum to cover the cost. Dr. Turnbull was of opinion that animal vaccination might overcome the objection of the Lingayat Wanis. He thought they do not accept vaccination, because they fear the lymph will be taken from their children's vesicles. The cost has been Rs. 47-11-6 for the 25 calves used. The percentage of success appears to be only 78 per cent. There were only 247 persons vaccinated with cow-lymph, and 399 with human lymph in a population of 18,560; so there has been progress, but I cannot speak very warmly of the percentage of success, which appears to be only 75 in vaccinations with cow-lymph here. I made an effort also to introduce the practice into Sholapur, but the municipality passed the following resolution on my letter :—"Regarding a grant of Rs. 100 for "introducing animal vaccination, on reading a letter from Dr. Pinkerton : "carried by a majority of 11 to 5, that animal vaccination is contrary to "the principles of the Hindu religion, and should not be introduced."

Animal vaccination in Barsi.

I remonstrated against the fallacy here expressed, but Mr. Ramsay replied that he was at the meeting of the municipality and "tried to impress "on the commissioners the absurdity of their scruples, pointing out to them the "example of Bombay and other towns; but my arguments were lost upon them. "I think it would be a mere waste of time to make another attempt." And so the matter rests as far as Sholápur is concerned. I do not think it advisable to urge the matter further, especially as vaccination from arm-to-arm is progressing very favourably now in the town of Sholápur. Dr. Raby in Belgaum and Mr. Leahy in Sakkhar endeavoured to start animal lymph, but neither succeeded.

Cow-lymph from Belgium.

35. One supply of cow-lymph was received in October last from Mons. Warlomont in Belgium, and it was successfully inoculated on two heifers in Bombay city. Government in their Resolution No. 1334, dated 29th April 1874, confirmed the grant of Rs. 60 per annum to pay for the annual supplies of cow-lymph from Brussels.

Dr. Husband's capillary tubes.

36. Capillary tubes are used to carry lymph long distances rather than put parents to great inconvenience. During the year the supply in store was exhausted, and Government telegraphed to the Secretary of State for 40,000— Government Resolution No. 3273, dated 14th November 1874. The Bombay Stores supply the Central Provinces as well as this Presidency. The vaccinators are using vaccine capillary tubes more and more.

Total cost.

37. The total expenditure in the year 1874-75 was Rs. 2,20,663-5-9 or Rs. 4,586-13-5 more than in the preceding year. The expenditure and incidence of the increase is

shown below. The increase in the Government establishment has been kept down by my holding charge of the Central circle.

Establishments.	Total expenditure.	Compared with the preceding year.	
		Increase.	Decrease.
	Rs. a. p.	Rs. a. p.	Rs. a. p.
Imperial	1,07,444 12 3	2,246 0 6	.....
Municipal	15,686 14 0	27 1 5	.....
Local Fund	59,753 8 11	595 8 5	.....
Native Chiefs	37,778 2 7	1,718 3 1	.....
Total...	2,20,663 5 9	4,586 13 5	.....

It is a pleasing feature in the above expenditure that native states, municipalities and local funds together have increased their expenditure in about the same rate as Government. In a paper now before Government I have shown how the vaccination charges ought to be considerably reduced by debiting a portion of the superintending charges to sanitation, because the supervising officers now are health officers as well as superintendents of vaccination.

Cost of each successful vaccination, excluding the pay of superintendents.

38. The cost of each successful vaccination is considerably influenced by the pay of the superintendent. In the Western Gujarath, Baroda and Kutch circles the cost of superintendence is much less than in the other circles, because the superintendents hold other substantive appointments from which nearly the whole of their pay is drawn, and again, the cost has been less than usual in the Central circle, owing to my having charge of it in addition to my duties of superintendent general. The pay of a superintendent may also vary in different circles according to rank and length of service. This quantity is, therefore, such a variable one that in comparing the cost of each successful case in one circle with another, it should be excluded. I have, therefore, excluded it from the following table, and also the cost of the four army vaccinators, because they do a great many vaccinations in regiments which do not appear in these four vaccinators' own returns:—

Name of Circle.	Name of Superintendent.	Successfully vaccinated and re-vaccinated.	Total cost excluding pay of superintendents.	Average cost of each successful vaccination.	Number of vaccinators.
1. Presidency ...	Dr. Anantá Chandrobá.	13,182	7,250 1 7	0 8 9	16
2. Central	Dr. J. Pinkerton ...	120,826	26,303 10 2	0 3 5	63
3. Southern	Dr. Raby	102,438	27,292 9 5	0 4 3	72
4. Western	Dr. Cody	75,229	22,557 3 2	0 4 9	56
5. Eastern Gujarath ...	Dr. Cola	82,950	20,423 6 9	0 3 11	46
6. Western do. ...	Dr. Blomfield	105,177	23,584 3 0	0 3 7	53
7. Sindh	Dr. Williams	126,777	25,850 1 5	0 3 3	50
8. Baroda	Dr. Seward	26,702	7,085 1 0	0 4 2	23
9. Kutch	Dr. Dorábji Hormasji...	2,795	2,566 3 3	0 14 8	11
Aden	Dr. Nolan	826	216 0 0	0 4 2	1
	Total...	656,902	163,128 7 9	0 3 11	385

Vaccination is again dearest in Kutch, but each successful vaccination was less than in the preceding year by one anna and seven pies. I wish I could add that it is as good as it is dear. But I fear it is just the reverse. Vaccination in Bombay city is the next most expensive; but here it is good, and I do not think it ever can be as cheap in a large city as in the country districts. The cost in the rest of the circles does not vary very much, but the Western is the highest a little, and Sindh the lowest. The general average cost of each successful vaccination, after excluding the pay of the superintendents, was 3 annas and 11 pies, or 7 pies less than was shown in the previous report; but, including all charges, it was 5 annas and 4 pies, or 10 pies less than in the preceeding year. Although the average cost of each successful vaccination has been nearly one anna reduced, still I am afraid our cost is high as compared with other provinces in India; but I do not think it is now too high for the work done, and for the surety that it is well done. It may still be reduced a little by the further extension of vaccination.

Cost of each successful vaccination including all charges.

39. What I have already written affords conclusive evidence that all the officers who have been working with me in the department last year have exerted themselves in a way that I cannot speak too highly of. When I say I am entirely satisfied, I express in terse and plain language what I mean; but if anything more be required, the figures below prove how active and energetic all have been:—

Inspections by the officers of the department

Name of.		Number of encampments.	Number of travelling days.	Distance travelled in miles.	Number of villages visited.	Number of vaccinated children inspected.
Circle.	Superintendent.					
1. Central	Dr. J. Pinkerton ...	50	79	1,126	156	8,142
2. Southern	Dr. Raby	81	127	1,353	260	13,734
3. Western	Dr. Cody	78	134	2,135	371	9,469
4. Eastern Gujarath ...	Dr. Cola	72	166	1,885	430	16,515
5. Western do. ...	Dr. Blomfield	58	128	1,489	237	15,129
6. Sindh...	Dr. Williams	116	153	3,227	500	11,616
	Total...	455	787	11,209	1,954	74,605

Before making any remarks on these figures, I must state that I held charge of the Central circle, and it is entered for the sake of showing the total inspections. The above figures do not show my travels, &c., in other circles in my capacity of superintendent general. Dr. Williams made the greatest number of encampments; Dr. Cola travelled the greatest number of days; Drs. Williams and Cody travelled the greatest number of miles; Drs. Williams and Cola visited the greatest number of villages; and Drs.

Cola, Blomfield, Raby and Williams inspected the greatest number of vaccinated children.

Two methods of testing the correctness of the returns.

40. There are two methods of testing the vaccinators' work: one is by calling over the names of the vaccinated children and seeing one by one that the entries in all the columns of the vaccination registers have been correctly filled up, as regards name, sex, caste, age and results; the second method is by collecting as many children as can be got together without much inconvenience to the people, and ascertaining the character of the vesicles or vaccine marks on their arms. The first method is, of course, by far the best, but it cannot always be done in large towns such as Poona, Dharwad, and many others. However in these towns most of the civil surgeons or dispensary officers see the vaccinator's work weekly, and this guards against falsification to an extent that may be accepted as sufficient. In the above table I have shown the total number of children inspected by superintendents. I now show below the number inspected by the first or better method of calling over the names from the vaccinators' registers :—

Circle.	Work tested by calling names from registers.								
	Present during inspection.			Absent during inspection.		Number of persons whom the vaccinator has returned as vaccinated.				
	Successful.		Unsuccessful including bad.	Absence accounted for.	Absence unaccounted for.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	Excess of operations over persons.
	Good.	Middling.								
1. Central...	5,969	571	464	2,701	...	8,765	518	452	9,735	30
2. Southern	5,184	635	459	3,200	58	8,625	399	512	9,536	...
3. Western	8,257	391	388	2,683	...	10,990	325	404	11,719	...
4. Eastern Gujarath ...	4,626	8,452	1,316	3,177	...	16,533	767	271	17,571	...
5. Western do. ...	4,176	986	968	3,202	243	8,745	468	362	9,575	...
6. Sindh	2,225	3,411	2,193	3,607	4	10,095	550	795	11,440	...
Total...	30,437	14,446	5,788	18,570	305	63,753	3,027	2,796	69,576	30

Dr. Cola called over no less them 17,571 names, and Dr. Cody 11,719. Dr. Williams is very nearly as high as Dr. Cody—but the smallest sum is quite sufficient for the object in view. I must add a remark here in explanation of the term "middling"—it means that the vesicles or cicatrices were not perfect—a middling success is a genuine success, but not a perfect one.

Work done by the superintendents.

41. These figures speak for the work of the superintendents during the past year. I can add nothing to what I have already said, and can only repeat that I am entirely satisfied, and I trust Government and the Surgeon General

will be so too. If there be any cause not to be so, it is in the one matter of the degeneration of the lymph during a small portion of the year, in parts of Drs. Cola, Blomfield and Williams' circles; but these officers, with their usual promptness, speedily replaced the less active lymph by pure vaccine virus.

Commendation of superintendents.

42. It has been customary to commend two or three of the most deserving officers of the department in the annual report; but when all have done so well, it is very difficult for me to perform this duty. However, as it must be done, I would beg to commend to the favourable notice of Government Drs. Williams and Cody; and I must not forget to notice the progress which Dr. Raby has made in the Southern circle. I cannot close this paragraph without noticing the long connection of Drs. Butler and Turnbull with this department, which has been severed, for at least a time, and probably, in both cases, permanently. Dr. Butler in Kathewád and Dr. Turnbull in the Central circle have earned reputations that will not be soon forgotten in the vaccination department.

Total number of children inspected.

43. The assistant superintendents inspected the vaccinators' work mostly by the best method of calling over the names of the vaccinated children. They tested 267,239 nominal entries in the vaccinators' registers. In no instance in British territory were any falsifications detected.

Inspections 47 per cent. of total operations.

44. The inspections of superintendents and assistant superintendents combined numbered 341,844, or fully 47 per cent. of the total operations of the year; and with the exceptions of the few falsifications detected by Dr. Blomfield in Kathewád and by Dr. Raby in one instance in Kolhapur state, no falsifications were noticed. Falsifications cannot escape our testings; but it is very much more to our credit to prevent falsifications than to find them out.

Conduct of the assistant superintendents.

45. The assistant superintendents as a body have given great satisfaction. One, who was acting on probation in Sindh circle, was found guilty of conniving at the absence of one of his vaccinators from his taluka, and was reverted to his former position of a vaccinator. Four of the best of them having served 3 years in the lowest grade, and having given entire satisfaction, were promoted to 2nd Class, and a fifth was also promoted on 1st May 1875. In my previous report it was stated that the only circle in which the assistant superintendents did not give entire satisfaction, was the Southern; but even there I am glad to be able to say that Dr. Raby in his report says they have done better. Dr. Blomfield has had reason not to be pleased with two of his assistants; one of whom he reports as wanting in intelligence and inattentive to orders, and the other was fined a month's pay for having taken a loan and supplies from one of his vaccinators. Both these men are marked, and if it be necessary they will be degraded to the position they formerly held before being appointed assistant superintendents.

46. Thus far I have reviewed the work of the department as a whole. I will now briefly show the work done by the different circles, next by establishments, and finally the progress made in each district of this Presidency.

47. There has been an increase in the number of vaccinations in all circles. Aden and Muscat are entered here for the sake of the total, but they are not circles in any sense; they are merely towns. In Aden only is there a decrease. The following figures show the increase in each circle :—

Operations of the different circles.

Circles.	Total number of persons vaccinated and re-vaccinated.		Compared with the preceding year.	
	1874-75.	1873-74.	Increase.	Decrease.
1. Presidency	14,707	13,907	800	.....
2. Central	130,347	121.541	8,806	.....
3. Southern	112,551	96,648	15,903	.....
4. Western	83,723	71,290	12,433	.....
5. Eastern Gujarath	90,644	85,584	5,060	.....
6. Western do.	116,535	111,253	5,282	.....
7. Sindh	142,767	111,124	31,643	.....
8. Barodá...	29,795	27,781	2,014	.....
9. Kutch	3,034	2.476	558	.....
Aden	1,097	1,265	.....	463
Muscat	144	.....	144	.....
Total...	725,344	642,869	82,643	168
Deduct decrease... ...			168	
Net Increase... ...			82,475	

48. The two Government civil vaccinators are employed in the camp and environs of Rájkot and of Dísá. They operated on 4,838 persons, or 458 more than last year. They averaged 2,419 operations each. The percentage of success in primary is 97·6, and in re-vaccinations 76·7.

Work of the Government establishment.

49. There were 51 municipal vaccinators at work, or 3 more than in the preceding year. They operated on 60,000, or 884 more than in the previous report. The increases and decreases are shown here by circles :—

Work of the municipal establishment.

	Increase.	Decrease.
Presidency Circle	800	...
Central do.	...	1,675
Southern do.	2,834	...
Western do.	422	...
Eastern Gujarath Circle	...	1,065
Western do.	637	...
Sindh ... do.	...	901
Aden	...	168
	4,693	3,809
Net increase ...	...	884

Causes of decreases in municipal vaccinators' work.

The decrease in the Central circle is owing to the abolition of the vaccinators in the towns of Walwa, Karhad and Narayangaon. The decrease in the Eastern Gujarath circle is attributed by Dr. Cola to the lymph deteriorating in Surat city. The decrease in Sindh circle is due to the reduction of one vaccinator in Karáchi town.

Causes of increases in municipal vaccinators' work.

The increase in the Presidency and Southern circles is due to an increase in the number of vaccinators. In the Western and Western Gujarath circles the increase is due apparently to the increased activity of the vaccinators themselves, which Dr. Cody, for his circle, says is the result of increased supervision by the assistant superintendents.

Average vaccinations by each municipal vaccinator.

The average number of persons operated on by each municipal vaccinator was 1,176, which is 652 less than the average for the whole presidency. This is not surprising, because the spheres of the municipal vaccinators are more limited than the other vaccinators have. The percentage of success in primary vaccinations is 95·9, or 3·0 higher than in the previous report. The cost of each successful vaccination is four annas and seven pies, or seven pies less than in 1873-74.

Work of the local fund establishment.

50. The number of local fund vaccinators was 203, or 1 more than before, and he was appointed in Kanada zilhá. These men operated on 427,658 persons, or 59,605 more than in the previous year. This immense increase is due to the greater activity of the vaccinators, to their using the birth registers to find out where the unprotected are and how many children there are available for vaccination, to the close supervision of the assistant superintendents, and to the zeal and ability of the superintendents of circles. The following figures show the increase in each circle :—

Central Circle	7,754
Southern	10,827
Western	9,897
Eastern Gujarath	2,293
Western do.	1,120
Sindh	27,714
Total Increase... ...	59,605

The greatest increase was in Sindh and was all re-vaccinations, there being actually a decrease of primary vaccinations. The best increase here is in the Southern circle, and Dr. Raby deserves credit for realizing the hope expressed by Government in their resolution on my former report. There is still room for progress in the Southern circle, and I am sure it will be made. Each local fund vaccinator averaged 2,106 persons operated on, or 284 more than in the preceding year. The percentage of success in primary vaccinations was 97·0 or 1·8 higher than in the previous report. The percentage of success

in re-vaccinations was 84·2. The cost of each successful case was 2 annas 4 pies, or 6 pies less than last year.

The work of the 129 native states' vaccinators.

51. The native states of this presidency maintained 129 vaccinators, or four more than in the previous year. The increase of vaccinators was one in Bhor; one in Sangli, one in Janjira, and one in Gondal. The number of persons vaccinated was 211,656, which gives an average of 1,640 to each vaccinator. The percentage of success was 95·9 in primary and 73·9 in re-vaccinations. Each successful vaccination cost three annas and one pie, or two pies less than in last report. The increase by circles is here shown:—

Central Circle	2,656
Southern do.	2,735
Western do.	1,558
Eastern Gujarath Circle	2,823
Western do.	2,613
Sindh Circle	5,368
Baroda do.	2,014
Kutch do.	558
Total Increase ...	20,325

The only considerable increase here is in Sindh circle, and regarding it Dr. Williams says:—"The increase in the work done in H. H. Ali Murad's "territory is due to the facts that two vaccinators were hard at work all the "year, and that they had literally new ground to work through; for as "vaccination had not been for years attempted till 1873-74, there was a "large accumulation of unprotected children in each village. This may be "seen at once by a reference to the ages of those vaccinated, of whom 1,675 "were under one year, whilst 7,861 were above one year; a ratio of about "17 to 82, or one to five nearly. The increase consists almost entirely of "primary vaccinations; there were only 163 re-vaccinations performed."

Dispensary vaccination.

52. Vaccination reports have been received from 110 dispensaries, and 5 jails have each sent in separate returns. The persons operated on amounted to 21,192 or 1,203 more than in the preceding year. The percentage of success in primary vaccinations is 92·5, or 1 per cent. better than in last year's report. The percentage in re-vaccinations is 58·4, or 4·7 less than in the year 1873-74. The average operations for each dispensary amounted to 184 for the whole year. Dr. Pearson of the N. W. Provinces has condemned dispensary vaccination, and he is a great authority. The experience of this presidency is that the operations are much less successful by dispensary officers than by the vaccinators. Still I think the object which I have held in view is one of so much importance, that I think the continuance of vaccination at dispensaries justifiable even though the percentage is not as high as it ought to be. The object I have held in view is this—that vaccination should be practised at a fixed place and time, and thus be an educating agency in the cause of vaccinaton. If we patiently wait and do our best, it may be hoped that dispensaries may yet realize the desired object. The progress that can be made as regards numbers is limited, and as regards success too in a measure because in many places only a small number can be vaccinated

in the year, and as the number is limited the choice of vaccinifers is also limited. By circles the increases and decreases in dispensary vaccinations are :—

	Increase.	Decrease.
Central Circle	71	...
Southern do.	...	493
Western do.	556	...
Eastern Gujarath Circle...	1,009	...
Western do. do.	454	...
Sindh Circle	...	538
Muscat	144	...
	2,234	1,031
Deduct Decrease ...	1,031	
Total Increase ...	1,203	

As regards the decrease in Sindh, Dr. Williams says :—"There has been "quite sufficient work done in the dispensary towns this year." Dr. Raby, with reference to the falling off in his circle, says it is "due in some measure "to the less number vaccinated by Mr. Mackenzie at Kumpta, who says he "has pretty well vaccinated every available child."

Aid of a peon to dispensary officers to help in carrying on vaccination.

53. With regard to the orders of Government in the 13th paragraph of their resolution No. 3998, dated 25th November 1873, I stated in my last report, paragraph 28, that Dr. Raby had made arrangements in his circle for dispensary officers being aided by a peon in carrying on vaccination. I have now to report that arrangements have been made at all dispensaries for giving the aid of a peon, or some other local official either permanently or on vaccination days.

54. In the Central circle the arrangements are :—

The dispensary officers at Dápuli, Vengurlá, Wái, Pusesáwali, Mhaswad, Pátan, Islámpur and Karhád will be given a mamlatdar's peon on the vaccination days. There is a peon entirely at the disposal of the Karnálá dispensary officer. Juner, Sirur, Saswad, Jejuri and Indápur are supplied with a special peon by the mamlatdars and municipalities concerned.

55. In the Western circle Dr. Cody says the dispensaries of Kalian, Thánà, Bassein, Bhiwandi, Bandora and Penth have each a peon. The dispensary servant assists at Sinnar. At Kurla, Kelvi Máhim, Ioli, Dindori, Irandol and Parolá the village police patel or other local officials assist the dispensary officers in carrying on vaccination. At Alibag and Pen the mamlatdar gives the aid of a peon. Dr. Cody adds: "I beg to "submit that supplementing any of the above means of assistance given to "dispensary officers, by a special peon, would, in the first place, be adding "considerably to the cost of each vaccination already viewed by Government "(*vide* Resolution No. 2473, dated 27th August 1874, General Department, "paragraph 9,) as averaging too high; and in the second place would be "substituting a means with little or no influence, as compared with the "present, to further the progress of vaccination. For these two reasons, I "have taken on myself the responsibility of making no representation to the "local authorities, with a view to obtain a special peon for vaccine purposes "for any dispensary in this circle, and so have taken no action on that part "of your Circular No. 1440, dated 27th February 1874, which direct such "recommendation."

56. In the Eastern Gujarath circle there is a special peon at each of the dispensaries of Ankleśar and Sádrá; a dispensary peon at Borsád, Mahmudábád, Mahudá and Godhrá; and at all the others the aid of a municipal peon or some other local official is obtained on vaccination days. Dr. Cola thinks the aid given at Balsád, Rándir, Jambusar, and Borsad, is not sufficient; but after a trial for a year or two, we will know exactly whether it is so or not.

57. In the Western Gujarath circle the dispensaries have each a peon.

58. In Sindh Dr. Williams thinks a special peon is an unnecessary expense, and he has made arrangements for the dispensary officers being assisted by existing local officials, viz., Kotwal's peon, Mukhtiarkar's peons, municipal peons or dispensary peons. At only one dispensary, viz., Manorá, there is no aid, and as there are only about twenty vaccinations a year there, Dr. Williams does not think any special aid necessary.

Army vaccinations

59. There was a decrease of 824 in the number of vaccinations in the Army in the year 1873-74, and again in this year's report there is a falling off of 2,074. As far as I can see, it appears to be due to want of subjects, as I have already stated.

Average number of vaccinations by each vaccinator for the whole department.

60. For the whole presidency the average number of vaccinations by each vaccinator is 1,828, or 176 more than in the preceding year. The four Army vaccinators are excluded from this calculation, because a good deal of their work is returned in regimental returns. By establishments the average of each vaccinator's work is as follows:—

1*st.*	2 Government Civil vaccinators...	...	2,419
2*nd.*	51 Municipal do. ...	...	1,176
3*rd.*	203 Local Fund do. ...	...	2,106
4*th.*	129 Native States do. ...	...	1,640

61. I shall now give the average number of vaccinations for each vaccinator by circles. I do so, because it is some merit to a superintendent to obtain a high average amount of work for each of the men serving under him:—

Circles.	Average number of persons vaccinated by each vaccinator.	Names of Superintendents.
1. Sindh	2,790	Surgeon J. Williams, M.D.
2. Western Gujarath... ...	2,141	Surgeon-Major Blomfield.
3. Central	2,001	Do. do. Pinkerton, M.D.
4. Eastern Gujarath	1,872	Dr. Cola.
5. Western	1,616	Surgeon Cody.
6. Southern	1,520	Do. Raby.
7. Baroda	1,295	Surgeon-Major Seward, M.D.
8. Aden	1,097	Surgeon Nolan, M.D.
9. Presidency	919	Mr. Anantá Chandrobá.
10. Kutch	275	Mr. Dorábji Hormasji.

The high average in Sindh is due to the very large number of re-vaccinations. Dr. Williams deserves great credit for having attained such a very high average. The Western Gujarath, Central and Eastern Gujarath circles have very good averages. Some improvement may be looked for in the Western and Southern circles. Baroda circle has room for great extension. In the Presidency circle I can hardly promise a much higher number of vaccinations than was reached in the year under report. In Kutch there is room for so great an extension that one might truly say the vaccinator has hardly begun to work in Kutch.

Conduct of vaccinators.

62. The conduct of the vaccinators, as a body, has been, I think, unusually good. In the Presidency circle they "generally conducted themselves well." In the Central circle the vaccinators have all behaved well. In the Western circle "the general conduct of the vaccinators has been good, though there are still "one or two men in Khandesh with whom I am far from satisfied." Dr. Cody here alludes to the manner of working rather than to the personal character of one or two of his men. Dr. Cola says that in Eastern Gujarath circle, with a few exceptions, their general conduct was good, but during the year he fined 15 vaccinators "chiefly for culpable negligence and working with "bad lymph, &c." In the Western Gujarath circle Dr. Blomfield says: "I "regret that I cannot report favourably of their conduct generally; of the 27 "whose work I inspected, only seven or eight gave me full satisfaction. The "principal faults were disobedience of orders, working with bad lymph, "neglecting to report small-pox, and falsifying their register; ten having "been convicted of the last offence.

"One man was dismissed, and four suspended for a time.

"With a view of enforcing attention to my orders and the proper per-"formance of their duty generally, I inflicted fines for which there is "in Kathewád a peculiar facility, as an extra Rs. 5 a month under the name "of batta is granted by the Chiefs to those of the vaccinators whose conduct "has satisfied the superintendent during the past six months; the batta "being paid at that interval."

It appears to me to be utterly wrong to merely fine a vaccinator for falsifying. It is a crime, and if a vaccinator be not prosecuted for the crime, he should certainly be dismissed the service. I hold that no superintendent ought to condone a crime by a fine. Falsification no longer disgraces the department in British territory, and it ought to be wiped out of native states too. With a view to this I directed Dr. Blomfield to issue a circular for the purpose of informing all the Chiefs' vaccinators in Kathewád, that any one found falsifying his register will be either prosecuted or dismissed the service. Dr. Blanc and Colonel Anderson achieved a great deal when they got the Chiefs to subscribe to a vaccination fund; and now I think we are bound to see that the vaccinators paid from that fund shall not give false returns. Dr. Williams says of the vaccinators in his circle:— "Taking the whole establishment, I cannot refrain from giving them the "greatest praise for the very hard work they have performed."

The following shows the casualities of the year:—

		Municipal.	Local Funds.	Native States.
Vaccinators.	Died	0	... 1	2
	Dismissed	0	... 6	4
	Resigned and discharged	0	... 6	1
	Pensioned	0	... 0	0

Clerks...	Dismissed	2	Government servants.
	Resigned and discharged	0	

Truthfulness of the returns.

63. The inspections of the superintendents and their assistants give ample testimony to the truthfulness of the vaccinators' returns in British territory. In native states there have been ten instances of falsifications reported by Dr. Blomfield in Kathewád. About the beginning of the current year (1875-76), the Gadinglaj vaccinator in Kolhapur native state was dismissed for falsifications. But as far as I can make out in both circles the falsifications were to a very limited extent. The returns even of most native states appear to be fairly correct, but I will not vouch in any way for the returns from Baroda and Kutch, where there is no real supervision at all.

The practice of inoculating with small-pox virus.

64. The practice of inoculating with the virus of small-pox has been said to be, by several writers, of *ancient* date in India, but there is no real evidence of its practice previous to the Mahomedan invasion. Within my own recollection the practice was common in this presidency; now, it has all but ceased. The inoculator has been driven to the wall by the vaccinator without the necessity of any legal penalty or even restriction; this is a first-rate testimony to vaccination: but it is probable that inoculation will not be quite abandoned until the old practitioners have died out of the land. Dr. Cody mentions in his report that inoculated small-pox had been introduced into three villages of the Mahad táluká, and adds that, owing to the Kolábá collectorate being so well vaccinated, the disease did not spread. Two inoculators were also detected in Thar Parkar district, one a native of the district, and the other from Jodpur state. Dr. Williams states that the practice in Kutch has been the means of keeping up small-pox there for the last few years, but the report from Kutch makes no mention of this. Speaking of the small-pox in Kolábá zilhá, Dr. Cody says: "I can fully account for how a portion "of this small-pox had its origin, and if I detail in full here the circumstances, "it is only to use them as an argument in favour of the introduction of "prohibitory measures against inoculation. In the course of the year the "vaccinator for the Mahád táluká, and Mr. Mahádeo Vináyak, the assistant "superintendent for Kolábá, both reported to me the presence of small-pox in "three villages of the Mahád táluká, viz., Chandwe, Parle and Selwade, at the "same time stating the origin of the disease was with some children who were "inoculated. The assistant superintendent stated in his report that he had "personally seen the children and found the marks of inoculation on their left "forearms—the usual place for inserting the inoculating virus by the Kumb-"hars who practise it. I sent these reports to the táluká mamlatdar with a "request that he would find out who the inoculator was and prevent a practice "so dangerous to the public health and safety. In the course of time I got "these reports back with some answers from the village patels and others, "endorsed by the mamlatdar who submitted them for my information. The "purport was that they all denied an inoculator had been at the villages at all "and stated the disease broke out of itself. There the matter ended, and so "will like cases always end until such time as local authorities are empowered "to punish inoculators. At present their hands are tied, and this is undoubt-"edly the reason why they treat such cases with an only too evident luke-"warmness. Why inoculation or the practice of it cannot be classed under the

" list of callings endangering the safety of the public health for the prohibi-
" tion of which the Penal Code provides is more than I can understand! It
" appears to me to be the one calling against which the section could be en-
" forced with most effect, for its danger is manifest; and it is entirely owing
" to the efficient way in which Kolábá is protected that such danger did not
" make itself a startling notoriety by imperilling the lives of thousands."

A false vaccinator in Sindh.

65. Dr. Williams mentions in his report that a false vaccinator has been detected in the practice of deceiving some villagers by making them believe he was a vaccinator. This is a most extraordinary testimony to the hold vaccination has acquired on the people of Sindh, and I note it accordingly and add Dr. Williams' own words. He says:—" A man named Lálkhán went about " representing himself to be a vaccinator and extorting money from the people " for operating. This man made punctures with a lancet in the ordinary man-" ner but had no lymph! He was found guilty by a 2nd Class Magistrate and " sentenced by Captain Crawford, the Political Superintendent, to two years' " rigorous imprisonment and fifty rupees fine, or in default of paying the fine " to six months' further rigorous imprisonment."

Vaccino-Syphilis.

66. Not a single instance has yet come to light of syphilis having been communicated by vaccination to any person in this presidency. And although this is only negative evidence, still it is backed by the fact that the medical officers of the department actually saw 74,605 vaccinated children last year, and their assistants saw 267,239 without even hearing of or seeing a suspicious case. The experience of the officers of this department is probably not equalled anywhere in the world, and notwithstanding every effort to discover a case of vaccino-syphilis not one has been seen. The observations of the officers of the department number over a million and a quarter in respect to this subject.

My tour.

67. My tour has two distinct features—one as superintendent general and the other as officiating superintendent of the Central circle. In the former capacity I visited the Sindh, Western, Southern and Presidency circles. Although I was unable to go about as much in the districts of Sindh as I could have wished, still I was quite satisfied that Dr. Williams had his circle in first-rate order. I saw all his assistant superintendents, and I feel sure that like their superior officer they are devoted to their duties. I visited Dr. Cody in the Thana and Nasik collectorates, and at the end of the year went through his district of Kolábá. I have every reason to be satisfied with his able and energetic superintendence of the Western circle. There is only one point about it I should like to see improved a little, and that is in regard to the cost of each successful case; but even in this respect there is some reduction, and I expect there will be a little more in the current year. I went through the Kaladgi zilhá of the Southern circle with Dr. Raby, and it afforded me very great pleasure to observe the improvements going on in this our backward circle. I feel assured that Dr. Raby had spared no pains to bring his circle forward, and if he continues his exertions, it will not be long before the Southern circle stands in as good a position as the other British circles do. I was also much pleased to find Dr. Raby's office in much nicer and better order than I had ever before seen it. I have every reason to be satisfied with Mr. Anantá Chandrobá in the Presidency circle.

He is devoted to his work and carries it on to my entire satisfaction. I did not visit the Gujarath circles.

In my tour as officiating superintendent of vaccination of the Central circle, I went through the zilhás of Poona, Sholapur, Satara, and Ratnagiri. Ahmadnagar zilhá alone was not visited, but it was very carefully gone over by Dr. Turnbull in the preceding year.

Tours of superintendents of circles.

68. In my former reports I never said much about the tours made by the superintendents of circles because generally the tour or a resume of it was printed in each superintendent's own report; but this year I must notice this very important subject, as the superintendents' reports are not to be printed. It would, however, make this part of my report too long were I to extract the whole of the tours from all the superintendents' reports; I will therefore only take the pith of each. I have already given my own tour in the capacity of superintendent of the Central circle. In the Southern circle Dr. Raby visited all his collectorates except Kanada, which he had just gone through at the end of the preceding year. He visited and inspected the work of all the Belgaum and Kaladgi vaccinators, most of the native states' vaccinators, and some of the Dharwad and Kanada vaccinators. Dr. Cody says of his tour:—"I was altogether about seven months on tour, and during that time "I visited each zilhá, and two out of the three native states. I saw the "work in thirty tálukás and pethás besides in the "native states of Jawár and Janjirá. I made during "the seven months 78 encampments, had 134 travelling days, travelled 2,135 "miles, visited 371 villages and inspected 9,469 children, all of whose names "were called from the register. Besides calling the names of the vaccinated "children from the registers and examining their arms as they appear, I gene- "rally inspect in the village the births' and deaths' registers, make inquiries "as to any prevailing diseases in the village, and usually advise the patel and "the elders as to what they should do on the appearance of small-pox, and "briefly explain the objects, &c., of vaccination." In the Eastern Gujarath circle Dr. Cola sums up his tour by saying:—"Thus the tour comprises travelling through all "the tálukás of Surat and Kheda zilhás, all but one "táluká of Broach zilhá, the whole of Mahi Kántha and three out of the five "tálukás of Panch Mahals. In all, the work of 30 vaccinators and 4 dispen- "saries was examined." In the Western Gujarath circle Dr. Blomfield says:—"I took charge from Dr. Butler and commenced "my tour in April at Gogo. I found the work of the "district vaccinator satisfactory. This man's district "comprises only the villages of the Gogo táluká, about sixty in number, and "they are interspersed among those of the Bhownagar state, of which he could "easily vaccinate an equal number, an arrangement however which would in- "terfere with the uniformity of the returns. At the Gogo dispensary the "lymph was bad, and fresh was introduced from Ahmadabad, which the apothe- "cary informed me turned out well and a good number of children vaccinated. "In Bhownagar town and district the work was good as far as it went; but a "large number were found unprotected, and the vaccinator having disobeyed "my orders by leaving the district where I directed him to vaccinate and re- "turning to Bhownagar under the pretence of sickness, was suspended for six "months. I then passed along the south coast inspecting in succession the

Dr. Raby's tour.

Dr. Cody's tour.

Dr. Cola's tour.

Dr. Blomfield's tour.

" districts of Talájá, Mowá, Jafrábád, Una and Viráwal; in each I found there
" had been much small-pox during the previous year and that it was still pre-
" vailing in Jafrábad, where the vaccinator denied its existence, although I
" found cases in the village in which he was residing. I found it also in Una
" and Viráwal to a small extent though the virulence of the epidemic had
" abated.

"The work in these five districts was bad, and the returns false, with
" the exception of Mowá, where that which I inspected was well done and the
" register correct.

"At Viráwal I was attacked by sunstroke on the 27th of May and was
" unable to travel until the 10th of June, when I started for Rájkot inspecting
" en route parts of the districts of Junágad, Jaitpur and Gondal dispensary, in
" all of which the work was indifferent. I arrived at Rájkot on the 20th of
" June.

" On the 5th November, I started again posting through Bhownagar to
" attend the thakur, who was sick. I there inspected the work of Lal Sing,
" who had been lately appointed, and found it satisfactory; but small-pox had
" recently appeared in the town.

" I then returned to the Jasdan district where the work was good. I
" discovered twelve cases of small-pox in one village and sent for the vacci-
" nator.

" In Botád some of the work was good, and the cicatrices from English
" lymph, introduced last year by Dr. Butler, some of the best I have ever seen;
" the vaccinator, however, had neglected parts of his district for three years
" and his register was false; as he had been previously discharged by Dr.
" Blanc for the same offence but re-appointed, he was dismissed the service.

" In Saela the work was middling and the register incorrect.

" In Wakaner the work was carelessly done and the register wilfully
" falsified.

" I then returned to Rájkot, finding in the district of the station vacci-
" nator that many of the children in his register had not been vaccinated by
" him, but by candidates who were placed with him for instruction. Having
" been directed by the superintendent general to inspect the district of
" Sanand in the Ahmadábád collectorate, in which the vaccinator was suspend-
" ed for charges brought against him by Assistant Superintendent Sardarmia,
" who also said the man was infirm and unfit for further service, I started on
" the 15th of January, passing through Saela. In the town I found that
" small-pox had prevailed during the monsoon and was still present, though
" only lately reported by the vaccinator.

" I next visited the Wadwan district where the vaccinator had been
" reported for false entries. I verified the report, and the superintendent
" general suggested his discharge; but as he had hitherto borne a good cha-
" racter, he was cautioned and reprimanded.

" I next passed through the border of the Limdi district, where I found
" the work neglected, but the vaccinator had commenced in that direction. In
" the Veramgaon district I found the new work good, but the old very bad,
" as reported last year by Dr. Butler; there had been much small-pox which was
" not reported, though the vaccinator had been at some of the villages while
" it prevailed.

"At Sanand, I saw the vaccinator Valabrám Dinánáth, and found him "quite competent to carry on the work which had been very much neglected, "and small-pox had been very prevalent, but not reported by him or the "Assistant Superintendent Sardarmia; his recent work however was good.

"With the consent of the superintendent general he was re-instated on "the 1st of March, having been suspended for two months.

"In the town of Sanand, which is in charge of the hospital assistant at "the dispensary, Balaji Mukund, the vaccination had been much neglected. "This man, who was on leave at the time of my visit, had been repeatedly "supplied with fresh lymph, which generally failed in his hands though re-"ported good by other vaccinators. I introduced good lymph before I left.

"At Veramgaon the work of the municipal vaccinator was good, but "the amount was insufficient.

"In Jinjiwada the cicatrices were middling, and there had been much "small-pox which had not been reported especially in the town of Lakhtar.

"In Dhrangdra the work was good, but small-pox prevailing to a small "extent. I saw several cases amongst the Dheds at the village of Matak. "I sent for the vaccinator who reported that it did not spread any further "after my visit.

"In the Morvi district small-pox was prevailing in an epidemic form; "it had previously been reported by Assistant Superintendent Ranchoddás, "who, with the assistance of a candidate, was engaged in suppressing it. "I found it in many villages, principally among the Dheds, who were en-"tirely unprotected.

"In Dharol, where I was at the end of the year, I found small-pox in "the Amrun and Juria tálukás. It is reported to be raging in the town of "Juria, which I am about to visit.

"On the whole, I think vaccination is making satisfactory progress in "the circle.

"In Kathewád, the only part of which I have any previous knowledge, "it has certainly made a great advance since 1867, when I acted as super-"intendent; but still small-pox is very prevalent, and nothing but constant "supervision will keep the vaccinators up to working in a way that will "effectually suppress it; they are too apt to be careless about their lymph, "and consequently much of their work is comparatively useless."

Dr. Williams' tour.

Dr. Williams' tour in Sindh covered nearly the whole province. In Karáchi zilhá he visited 6 tálukás and 4 dispensaries. In Haidrabad collectorate he visited 8 tálukás. In Shikarpur zilhá 13 tálukás, and the whole of the tálukás in the Upper Sindh Frontier district and in the Thar and Parkar. He inspected every dispensary on his route.

Aid from civil and political officers.

69. It may be said that the backbone of the department is the aid and support it receives from the revenue and political officers. The officers of the department are the head and arms; but they would fall to pieces in useless efforts without the willing aid of all local authorities. This dependence on such aid is probably more marked here under our voluntary system than it would be among a more highly educated and better off people; but, even

where vaccination is compulsory, and the people highly educated and well-off, as in England, Germany and Sweden, the influence of local authorities is a constant moral aid to the compulsion of the law; and we have seen the disastrous results of ignoring such aid in the epidemics of small-pox which have in recent years afflicted London as compared with the immunity of Sweden, where the influence of the clergy, all officials and leading men of the country throw the weight of their influence on the side of the law of compulsion. While then heartily acknowledging the moral aid of the revenue and political officers, I invoke its continuance. The youngest revenue officer can aid the department by merely calling for a village register of vaccination and calculating roughly the rate per mille vaccinated to population in say the preceding two years. We should certainly aim at vaccinating over 30 per mille annually of the population if the births be 40·96 per mille.

Deaths from small-pox.

70. In table No. VII. I have shown, in the last column, the number of deaths from small-pox in each registration circle. The total registered for the whole presidency in the calendar year 1874 was 3,903, in 1873 the number was 9,946, and in 1872 it was 26,699. There is not the least doubt about the uncertainty of these figures, and I consider them so unreliable for statistical purposes, that I place no exact value on them; but, although they are not of any exact statistical value, they are of this relative value—that they show the deaths from small-pox were very many fewer in 1874 than in 1873, and many fewer in 1873 than in 1872.

The immunity from small-pox of a district, in any particular year, must not be looked on as an indication of vaccination having been more thorough there than in other districts which may have been afflicted by the disease—for instance, the Ratnágiri collectorate is one of the best vaccinated districts in the Central circle, and yet there were more deaths in it in 1874 than in all the other four collectorates of the circle put together. I do not think we can reasonably expect ever to prevent small-pox entirely by voluntary vaccination, because in all districts there remains an annual residuum of unvaccinated which, after accumulating for several years, gives a fine field for small-pox. At this moment I illustrate what I say by Belgáum and Dhárwád—in each of these zilhás the residuum is so large that I can safely predict that a wave of small-pox may shortly be expected to sweep over their populations; but the people are so generally protected, that the disease will probably not arouse attention until the deaths are tabulated at the end of the year. In my remarks on the progress of vaccination in each district, I will notice the number of deaths in each.

Small-pox deaths in Central circle.

1*st*.—The Central circle has been free of any epidemic, but still the deaths numbered 572.

Small-pox in the Southern circle.

2*nd*.—Dr. Raby says there have been a good many cases of small-pox in Kánadá; but the returns show that there were a good many in all the zilhás of the Southern circle—indeed, nearly the half of the total deaths occurred in Dr. Raby's circle; 1,592 in the 4 zilhás.

Small-pox in the Eastern Gujarath circle.

3*rd*.—Dr. Cola says:—"Sporadic cases occurred in some parts of Panch "Mahals about the early part of January; and, about "the close of the year, the disease appeared in Kasba "Randir and some villages of Chorási, Ulpad, and "Mándvi tálukás of Surat zilhá, and it was traced to have been intro-

" duced from Kamrej pargana of Gaikawadi territory; everywhere the dis-
" ease was readily checked. In the whole of Gujarath a very severe epidemic
" of measles and chicken-pox prevailed from February up to the close of
" the year." 473 deaths were reported.

Small-pox in the Western Gujarath circle.

4th.—Dr. Blomfield notices the prevalence of the disease in Kathewád, and western part of Ahmadábád district, and in the Pálanpur state. 388 deaths are returned from Ahmadábád zilhá.

Small-pox in Sindh.

5th.—Dr. Williams says:—" Taking the year 1874—from January to
" December—by itself, there have been but few deaths
" from small-pox. But in the latter part of the official
" year, *i.e.*, the first three months of 1875, many people
" will have died from small-pox, especially in Gadrá, táluká Chachrá, in the
" Thar and Parkar zilhá. As the returns to the sanitary commissioner are
" available for the calendar year, and those for February and March have not
" yet been received, it will be more convenient for comparison if I give the
" number of deaths from small-pox for the year 1874.

" In the Karáchi collectorate:—6 in January, 1 in February, and 1 in
" March in the town of Karáchi; and 2 in February and 1 in July in the
" táluká of Jati;—making a total of 11.

" In the Haidárabad collectorate, no death from small-pox returned.*

" In the Shikárpur collectorate, there are five deaths given; viz., 1 in
" April in the táluká of Ubáoro, 1 in May in Ghotki, and 3 in June in a
" village near Sitá in Kakar. I am almost certain these latter three were not
" from small-pox, as there was not a single case of the disease within a radius
" of 150 miles of Sita. It is very strange to have three deaths from small-pox
" in one village and not a trace of the disease to be found by the assistant
" superintendent who went to make special inquiries. When I marched by,
" the village had been deserted owing to its having been submerged by the
" terrible floods that inundated the right bank of the Indus last year.

" In the Frontier Upper Sindh no death recorded.

" In the Thar and Parkar districts 1 death in July in the táluká of
" Chachrá.

" This gives a total of 17 deaths from small-pox (including 3 doubtful)
" registered in Sindh in the year 1874.

" There were 5 deaths from measles registered by mistake as small-pox,
" viz., 1 in May† and 2 in June in the táluká of Chachrá; and 1 in May in the
" táluká of Sanghar‡ both in the Thar and Parkar; and 1 case in November
" in the táluká of Shahbandar in the Karáchi collectorate.

" But all the deaths from small-pox have not been registerted. In
" addition to the above the following have been reported by the assistant
" superintendents or the vaccinators, viz., 4 in Jati (1 in April, 2 in June and

* This is incorrect, because 1 is returned from Allyar Ka Tanda.—J. P.

† There were no deaths from small-pox registered in May in Chachrá district.—J. P.

‡ There was no small-pox death registered in Sanghar district, so this appears to be an error on the part of Dr. Williams.—J. P.

"1 in July) in the Karáchi collectorate*; 1 in Badin in July in the Haidr-"abad collectorate; one in Ghotki in April in the Shikarpur collectorate; "2 in Thul* in May in the Jacobabad district; and 4 in Nagar Parkar (3† "in May and 1 in June) in the Thar and Parkar district.

"These 12 added to the above 17, give, as the total of deaths from "small-pox in Sindh in the year 1874, 29, which is considerably less than "that of 1873.

"But the total for the latter year given at page 157 of the Vaccination "Report for the year 1873-74, and which has been taken from the returns of "the sanitary commissioner, is incorrect. The following deaths from measles "should have been deducted, viz., Sehwan 12, Manjhandá 1, and Khandiárá 5. "This would reduce the 81 to 63 deaths probably from small-pox. The "number of cases of small-pox reported during the year was 375, which is "probably below the mark; but accepting it for what it is worth, it shows "the ratio of deaths to attacks to be not greater than 1 in 13. This is no "doubt due to so many of the cases being very mild and the disease modified "by either previous inoculation or vaccination.

Prevalence of the disease during the year.

"In April the disease was already present in Jati and was conveyed "thence to Badin in the same month, where it prevail-"ed to a very slight extent till September, as its occur-"rence was not reported till August. In the same "month, too, the disease was imported a fresh from Kutch into the towns of "Karáchi, Shahbandar and Nagar Párkar; and into Mirpur Mátelo and "Ghotki from Jesulmir and Bháwalpur.

"In May the disease was introduced into Ubáoro and Thul from Bháwal-"pur.

"It was comparatively easily subdued, and the province was, with an "exception or two, free from it till December, when it was again introduced "into Ubáoro from Bháwalpur; into Chachrá from Jodhpur, and into Nagar "Párkar from Wághar in Kutch.

"In January, February and March the disease kept pouring in from "Jodhpur and Kutch, and was brought into the tálukás of Kiprá, Chachrá, "Umarkot, Nagar Párkar, Mitti and Diplá in the Thar and Parkar districts, "into the town of Karáchi, and into the tálukás of Badin and Baga-jo-Tando, "in the Haidrabad collectorate, where generally speaking it exists now. I can "hardly understand how it has not yet shown itself in Haidrabad, for there is "almost constant communication between all these places and that town.

Small-pox in Kutch.

6*th*. Mr. Dorábji Hormasji in the report for Kutch, says:—"During "the last three months small-pox was raging with "violence; especially in February. It is now (April) "fast disappearing."

To sum up, the year was a non-epidemic one, and the deaths have been comparatively few, and of even these, there is the known fact that deaths from measles have been reported as from small-pox in some cases. Thus taking the city of Bombay, where there were 258 deaths returned, it has been ascertained that in the 73 deaths which were reported in the last four months of the

Small-pox in Bombay City.

* This is not correct, as they have been registered.—J. P.

† One in May has been registered.—J. P.

year 26 really died of measles. Here is an error to the extent of 35 per cent. The errors so carefully and precisely shown by Dr. Williams exhibit how useless the small-pox deaths' returns really are as far as exact knowledge is concerned.

The frequent irruptions of small-pox into Sindh was brought to the notice of Government through the Commissioner in Sindh's Memorandum No. 243, dated 9th March 1875, giving cover to Dr. Williams' letter No. 921, dated 20th idem, and Government in their Resolution No. 849, dated 20th idem, in the General Department, transfer red the subject to the Political Department, and a Resolution was passed, in order to ascertain if a better system of vaccination could be introduced into Kutch and into the Rajputana states, which was communicated to the political officers there.

Obstacles to the spread of vaccination.

71. It may be affirmed generally that there is no real opposition to vaccination anywhere now; but if we come to particulars we note a good deal of apathy and carelessness on the part of communities that are not only intelligent but are believers in the value of vaccination as a prophylactic. Then again there are limited areas, or rather castes, in which vaccination makes but slow progress; such are the tálukás of Nargund and Ron in Dharwad collectorate, and in a part of Bombay city itself. In the first instance, the caste is the Lingayat Wánis who stop progress; in Bombay it is the Mahomedans. Dr. Raby has complained of want of assistance, in collecting the children for inspections, from village officials in some few instances. But I do not think the officers of the department have much to complain of in this respect. Speaking for myself I can say I do not meet the least difficulty, and further I have almost always met with the very best attention from village officers. But even if an officer of the department occasionally do meet with some little want of the usual politeness of village officials, it cannot be very much wondered at, for it is self-evident that our inspections must be a trouble to parents: they cannot bring their children for our inspection without leaving their own work to stand for at least some little time. These inspections are absolutely necessary, because without them Government could not be certain that the vaccinations are good. Mr. E. P. Robertson, collector of Dharwad, in his letter No. 3783, dated 10th December 1874, says:—"The Lingayat community is especially strong in the Nar- "gund and Ron tálukás, and it is only by practical endeavours on the part of "the vaccinators that the strong caste and religious prejudices of these persons "can be overcome." Again he says:—"Where the people, the Lingayats, are "deeply opposed to vaccination your department (vaccination) cannot expect "to get zealous aid from Lingayat village officers. As time passes on we "must hope that education and progress will do much towards removing "the prejudices. To needlessly drive and irritate them will do more harm "than good." I endorse every word of Mr. E. P. Robertson's views; and I will only add that the officers of the department, as a body, have always tried to lead rather than to drive, and to the tact and discretion of the individual officers who have served in each circle is due in a great measure the progress made. A diagram of progress for the circles would almost be an infallible index of the tact, discretion, and wisdom of the different superintendents who have held charge of each circle. I conclude this paragraph by the statement that there is not a single difficulty that the department cannot look forward to overcome in a reasonable time, and it would be injudicious to hurry on or drive the few prejudiced who still oppose our endeavours to

protect their offspring from the dangers of small-pox. To attempt to drive them would not only defeat our object but would bring odium on Government.

Maps supplied to vaccinators.

72. During the past year a good many of the vaccinators have received maps of their tálukás, and as soon as Mr. Light can supply the remainder they will be issued to the vaccinators. In the Southern circle Dr. Raby has numbered each village on the maps in a serial order, thus, 1, 2, 3, 4, &c., and his vaccinators are to go over their táluká villages in the serial order. This, I believe, will answer most admirably, and will ensure that all villages are visited.

Inspection of dispensaries.

73. In the revised rules regarding charitable dispensaries (1875) paragraph 23, Government have ordered superintendents of vaccination to inspect the dispensaries in their circles when they are on tour. Dr. Cody, in reference to the orders of Government, has asked for further and more particular orders, and in submitting his letter to Government I suggested that superintendents of vaccination, after inspecting a dispensary should put on record in a visitor's book in the dispensary their opinions on the following points, viz. :—1st, the general character of the dispensary officer. Superintendents have many opportunities of learning about this in the districts as well as in the dispensary towns; 2nd, the method of carrying on work in the dispensary and any suggestions for improving it; 3rd, the state of the building as regards (*a*) site; (*b*) capacity; whether sufficient for the wants of the locality; (*c*) cleanliness; and (*d*) ventilation; 4th, state of medicines, instruments, and records; 5th, as to expenditure, whether capable of reduction or advisable to increase it for greater efficiency; and 6th, any other subjects worth noting. The remarks so written should be copied out in duplicate by the dispensary officer and sent to the superintendent's camp for signature; and he should then send one to the deputy surgeon-general and the other to the collector, and he might communicate personally or by letter with the district committee.

I think these inspections by the superintendents ought to be of great benefit; and I feel sure that every one of the officers of this department will do his best to meet the wishes of Government.

Progress of vaccination in each district.

74. Thus far this report has been of the department and its work as a whole and by establishments. I will now show the progress of vaccination in each district. The remarks I am about to make will show the state of vaccination in each collectorate, and will save the general reader from having to make tedious calculations, and will enable any one to see, almost at a glance, the progress made, &c., in any district or native state.

75. The percentages of success given in the following remarks, refer only to the work of the vaccinators, and not to dispensaries.

Progress in the Presidency circle.

76. The City of Bombay has a population of 664,405, and the island has an area of 19 square miles. Under the superintendent there are 16 vaccinators maintained by the municipality; so each has an average population of 41,525, and an area of fully one square mile. The primary vaccinations numbered 13,145, or 3,118 more than in the preceding year, 19·3 per mille

of population were successfully vaccinated. The re-vaccinations numbered 1,562. The percentage of success in primary vaccinations was 95·0, or 7·1 higher than in the previous year; in re-vaccinations it was 54·0. Each vaccinator vaccinated or re-vaccinated 919 persons, or 345 less than in 1873-74; this is owing to the number of vaccinators being higher than in the preceding year. The average cost of each successful operation was 13 annas and 10 pies, or 3 annas and 5 pies less than in the former report. The progress in this circle is as satisfactory as can be expected. The deaths from small-pox are returned for the official year at 224, and for the calendar year 1874 at 258. The disease is endemic; only 6 deaths occurred in the three months of August, September, and October, and 60 in April. I visited the Byculla Station several times, and saw Mr. Anantá Chandrobá practising both on the human subject and on the calves. I am satisfied that he and his establishment are doing all they can, in the city of Bombay, to protect life from small-pox.

Progress in the Central circle.

77. The Central circle was about half the year in charge of Dr. Turnbull; in the latter half it has been under mine. The population is 4,866,162, and the area 28,282 square miles; this is exclusive of Poona and Kirkee cantonments, but inclusive of the native state of Jat. There are 6 assistant superintendents and 63 vaccinators. Each vaccinator has an average population of 77,240 and an area of 448 square miles. The primary vaccinations numbered 129,405, including vaccinations at 24 dispensaries and 2 jails; and the successfully vaccinated were 25·5 per mille of population. The percentage of success on operations was 97·2. Re-vaccinations numbered only 942. The vaccinations done by each vaccinator averaged 2,001, or 173 above the average for the whole presidency. Each successful vaccination cost 4 annas and 2 pies, or 1 anna 2 pies less than the average. There were 572 deaths from small-pox in the five collectorates of Poona, Sátárá, Sholápur, Ahmadnagar, and Ratnágiri, but it is not known how many there were in the native states of Bhor, Phaltan, Jat, Atpadi and Akalkot. The progress in this circle is on the whole very satisfactory. I went through all the districts, except one last cold season.

Poona collectorate.

78. The Poona collectorate has a population of 878,785, exclusive of Poona and Kirki cantonments, and an area of 5,095 square miles. There are 8 local fund and 3 municipal vaccinators, and returns have been received from 8 dispensaries. For each of the 11 vaccinators there is an average population of 79,889, which is too high, and an average area of 463 square miles; but these averages do not convey a good idea of the actual of each vaccinator's charge: for instance the Haveli táluká vaccinator has a population of 155,082 and an area of 766 square miles. It is impossible for one vaccinator thoroughly to vaccinate this population in such an area; and these remarks also apply to Khed and Bhimthadi tálukás. Each of these 3 tálukás ought to have two local fund vaccinators instead of only one. The total number primarily vaccinated, including the work of the dispensaries, was 19,381, or 2,408 more than in the previous year—this gives 20·0 successfully vaccinated per mille of population, which is lamentably low, and but little hope can be entertained of much further increase without more vaccinators. It would be well to have 4 more, but at least 3 are absolutely necessary. The re-vaccinations amounted to only 22. Each vaccinator vaccinated on an average 1,679. The percentage of success in primary vaccinations is 95·6, and in re-vaccinations 47·0. I am

sorry I cannot speak well of the progress; the establishment has worked well, but is too weak. The total deaths from small-pox were 129. I went through this zilhá last November.

Ahmadnagar collectorate.

79. The population of Ahmadnagar is 773,938, and the area is 6,647. There are 11 local fund vaccinators and one municipal vaccinator. The average for each vaccinator is 64,494 population and 554 square miles. The average area is large, but the average population is not. The total number of primary vaccinations is 24,378, including the vaccinations done at the dispensaries of Ahmadnagar and Sangamner and in one jail, which only amounted to 172. The successful operations per mille of population were 30·5, which is very satisfactory, as compared with many other zilhás. The success in primary vaccinations was 98·3 per cent., and in re-vaccinations 75·0. There were only 8 re-vaccinations. Each vaccinator's number of operations averaged 2,017, which is very high. There were only 22 deaths from small-pox. This is the only zilhá in the Central circle I did not visit on my last tour.

Sholápur collectorate.

80. In Sholápur collectorate the population is 662,986, and the area 3,925 square miles. There are 6 local fund and 3 municipal vaccinators, so each has an average of 73,665 population and 436 square miles, neither of which is too great; but the 3 municipal vaccinators have nothing like the average, so several of the táluká vaccinators have too great an area and too high a population—thus, the táluká vaccinators of Sholápur and Bársi would have far too great a charge had they not been relieved by the municipal vaccinators taking charge of some of the villages around the towns of Sholápur and Bársi; and besides this, the Pandharpur táluká vaccinator has been given some of the Sholápur táluká villages. Had this arrangement not been made Sholápur and Bársi would require at least 2 táluká vaccinators each, and I think it would be well if there were a second local fund vaccinator appointed to Karmálá táluká, and another to Mádhe, which are both too large for one man. The primary vaccinations numbered 17,498, the vaccinations at 4 dispensaries and 1 jail—761—are included; this gives 25·5 successful operations per mille of population. The percentage of success is 96·3 in primary vaccinations, and 66·6 in re-vaccinations; but there were only 23 re-vaccinations altogether. Each vaccinator averaged 1,861 vaccinations, which is a very fair number. The progress is satisfactory, but the vaccinators are too few by at least two for the zilhá, and there is no doubt but that an increase of vaccinators would be most beneficial. On my tour I went over the work of every vaccinator very carefully, and I was struck with the evidences of the great amount of small-pox which prevailed in 1872. From what I saw I can safely predict that a periodic epidemic must occur, while so large a number annually remain unvaccinated in the tálukás of Karmálá and Mádhe. It is just as certain as that night will follow day. Two more vaccinators would cost Rs. 600 per annum. There were only 29 deaths from small-pox.

Sátárá collectorate.

81. The collectorate of Sátárá has a population of 1,116,050, and an area of 5,378 square miles. There are 12 local fund and 2 municipal vaccinators. Each vaccinator has an average of 79,718 of population and 384 of square miles. There are 3 tálukás in this zilhá which are each too large for one vaccinator, viz., Walwa, Karhad and Pátan. I have written to Mr. Moore on the subject, and he has replied that he will submit my proposals to increase the vaccinators by 3 to the local fund committee when making up the next budget. The primary

vaccinations numbered 31,327, or 27·3 successful operations per mille of population, and the success in primary vaccinations was 98·2 per cent., and in re-vaccinations 77·7. There were only 79 re-vaccinations. Each vaccinator's average number of vaccinations was 2,173. The progress in this zilhá is very satisfactory. There were only 71 deaths from small-pox. I went through this zilhá from east to west in February last.

Ratnágiri collectorate.

82. The collectorate of Ratnágiri has a population of 1,019,136, and an area of 3,868 square miles. There are 11 local fund vaccinators, so they have an average of 92,648 of population, and 351 of square miles each; the former is a very high average, and the latter a very fair one, but the vaccinators in the tálukás of Ratnágiri, Dápuli and Deogad have respectively populations of 119,741, 143,137 and 118,921, all much too large for one man to protect thoroughly. There were 28,343 primary vaccinations, or 27·3 successful operations per mille of population, and the percentage of success in primary vaccinations was 96·6. The re-vaccinations reached 810, and the percentage of successful in them was 57·8. Each vaccinator averaged 2,550 vaccinations, which is the highest in the circle. Although there is less work in this report than in the preceding year, still the year's outturn must be considered satisfactory, and is probably about as high as can be maintained for a series of years by the present staff of vaccinators. I regret to notice 321 deaths from small-pox during the year, which is more than occurred in the other four zilhás of the Central circle put together. I went through a portion of this zilhá in March.

Native states.

83. There are 5 native states in the Central circle, viz.:—

Akalkot,	population	81,068	area	498 square miles.
Bhor	„	136,075	„	1,491 „
Jat	„	70,665	„	770 „
Atpadi	„	68,335	„	213 „
Phaltan	„	59,124	„	397 „
		415,267		3,369

There are 6 vaccinators. The primary vaccinations were 8,478, or 19·1 per mille of population. The percentage of success is 97·0, and the average vaccinations for each vaccinator are only 1,358. There is room for much extension here. I visited Akalkot and Jat in January.

Progress in Southern circle.

84. The Southern circle is superintended by Surgeon Raby; he has 5 assistant superintendents and 72 vaccinators. The population is 4,762,457 and the area 25,569 square miles. Each vaccinator has a population of 66,145 and 355 square miles. The primary vaccinations amounted to 109,741, including work done at 15 dispensaries and 1 jail, and the success on the whole was 96·9. There were only 21·7 per mille of population successfully vaccinated. The re-vaccinations were only 2,810. Each vaccinator operated on 1,520 persons on an average, which is 308 below the general average. The cost of each successful vaccination was 5 annas and 4 pies, or exactly the same as the general average. The deaths from small-pox were 1,592, a number considerably greater than in any other circle. Taken as a whole this circle is still behind the other circles in British territory—but it is advancing with steady progress. I have given this circle a good deal of attention, and I am very much pleased to see that Dr. Raby

gives promise of bringing his circle to the front before very long. I met Dr. Raby in Kaladgi zilhá in January last.

Belgaum zilhá.

85. The population of Belgaum zilhá is 938,750 and the area is 4,592. There are 8 local fund and 2 municipal vaccinators, and returns are received from the dispensary of Athni. Each vaccinator has an area of 459 square miles and a population of 93,875—both these averages are much too large, but 3 additional local fund vaccinators have been appointed since the beginning of the current year. It is however probable that the municipality of Gokak will be unable to keep up their vaccinator, so the total number of vaccinators is likely to be 12, and if that be the number then each will have an average population of 78,229 and 383 square miles: the average population for each vaccinator will even then be high. The primary vaccinations numbered 16,146, and there were only 16·4 per mille of population successfully vaccinated. This is only 0·6 more than in the preceding year, and is very low—probably about half of what might be vaccinated if there were sufficient vaccinators to cover the population properly. This zilhá is by far the most backward in this presidency. It is so much so, that I think the subject demands the attention of the collector, and I have pointedly drawn his attention to it. The average work of each vaccinator is actually 96 above the average for the whole of the Southern circle, and although Dr. Raby expected more work from the vaccinators of this zilhá, yet I think more than 12 men are required for a population which is close on a million. The percentage of success was 97·6 in primary and 69·3 in re-vaccinations. Each vaccinator vaccinated on an average 1,616. There were 537 deaths from small-pox, which is the highest number recorded in any zilhá, so that the deaths from small-pox is greatest where vaccination has least extended. The progress of vaccination in this zilhá is slow and unsatisfactory.

Dharwad collectorate.

86. The Dharwad collectorate has a population of 988,037 and an area of 4,565 square miles. There are 11 local fund and 3 municipal vaccinators, so the 14 have an average area of 326 square miles and a population of 70,574—these are fair averages. The primary vaccinations reached 21,281, or nearly five thousand more than in the preceding year. There were only 20·2 per mille of the population successfully vaccinated, which is about two-thirds of what we may hope to reach when vaccination is generally accepted in this zilhá. The percentage of success in primary vaccinations was 96·1. The re-vaccinations only numbered 703, and the success was 38·9 per cent. Each vaccinator's work only reached 1,565, which is considerably below the average for the whole presidency. There were 485 deaths from small-pox. In this respect Dharwad stands next to Belgaum as also in the co-relation of the limited extension of vaccination. In this zilhá there are several tálukás where vaccination has never yet been freely accepted, and where opposition to it has been markedly displayed by the Lingayats. I do not think it would be wise to unduly press the extension of vaccination; it will be better to trust to time and the quiet but gentle pressure that each vaccinator can make in his own táluká; more might arouse a spirit of opposition which could not be allayed in a lifetime. I feel certain that here we may safely trust to time and vaccination's own merits carrying the people with us at no very distant day.

Kaladgi collectorate.

87. The area of Kaladgi zilhá is 5,695 square miles and the population is 816,037. There were 8 local funds and 3 municipal vaccinators; but one of the latter only worked

for 2 months, so I shall reckon the total at 10. Each vaccinator had an average area of 569 square miles and a population of 81,603 : both averages are too large. There were 18,887 primary vaccinations or an increase of nearly 5,000, but the successfully vaccinated amounted to only 21·5 per mille of population. The percentage of success was 97·6. Re-vaccinations only numbered 199. Each vaccinator on an average vaccinated 1,734 persons. Small-pox killed 286. Like Belgaum and Dharwad there is much room for further extension here, and I am happy to say there is every probability that the increase next year will be even higher than here shown. I went through this zilhá last January, and I feel sure that real progress is being made.

Kanada collectorate.

88. This zilhá has a population of 398,406 and an area of 4,235 square miles. There were 11 local fund vaccinators, and one municipal vaccinator worked in Karwar for 2 months only. Each man has an average of 36,219 population and of 385 square miles —the former is the lowest average in this presidency, but considering the dense jungle or rather forests in which a great portion of the people live the vaccinators are none too many. The primary vaccinations were 17,008, and the successfully vaccinated were 40·3 per mille of population. The percentage of success was 97·4. Only 320 persons were re-vaccinated. Each vaccinator on an average operated on 1,461 persons. Small-pox was present the whole year and carried off 284 persons—had the people been less protected by vaccination, the probability is that the deaths would have been very great; the fewest deaths occurred in November and the most in March. This zilhá seems to be more afflicted with the presence of small-pox than any other, and to propitiate the goddess Marima Devi there is a jatra every second year held at Sirsi where sacrifices are offered up of sheep, goats, buffaloes and cocks—about 12,000 people assemble at the fair to fulfil vows or to ask favours and protection from small-pox. Vaccination has progressed more in this zilhá than in any of the others of the Southern circle, and yet it has been under our system of vaccination only since 1862.

The native states of the Southern circle.

89. The native states in the Southern circle are divided into—1st Kolhapur, 2nd Southern Maratha states, and 3rd Sawant Wadi.

Kolhapur.

90. The population of Kolhapur state is 802,691 and the area 2,778 square miles. The number of vaccinators is 11, so each has an average population of 72,972 and an area of 252 square miles. There is an assistant superintendent also maintained by this state. The primary vaccinations were 17,558, of which 484 were done at the Sadar station by the hospital establishments. There were only 20·6 per mille of population successfully vaccinated, and the percentage of success on the total operations was 97·6. The re-vaccinations numbered only 378, and the percentage of success in them was 89·3; each vaccinator operated, on an average, on 1,553 persons. I have no return of small-pox deaths. The progress here is not as great as I could wish it, but it is improving slowly, and I doubt not but the watchful and fostering care of Colonel Schneider will do for this state what he did so well for Sawant Wadi.

Southern Maratha states.

91. The Southern Maratha chiefs maintain 14 vaccinators for a population of 627,722 in an area of 2,804 square miles; so each vaccinator's average is 44,837 of population and 200 square miles—both small averages. The primary vaccinations were 11,510, and there were only 17 per mille of population success-

fully vaccinated; on the total operations the percentage of success was 94·9—re-vaccinations only numbered 70. Each vaccinator averaged only 827 persons. Except for Kutch this is the smallest average in this presidency, but I trust next year Dr. Raby will be able to show more work done by these Southern Maratha states vaccinators. I have no returns of small-pox. The progress is not quite satisfactory. Captain Waller, the joint administrator of Sangli, is taking much interest in the vaccination work; so as far as that state is concerned, I expect a good outturn of work in the current year.

Sawant Wadi.

92. Sawant Wadi has a population of 190,814 and an area of 900 square miles. There is only 1 vaccinator, but he has several sepoys who also aid him in vaccinating. The primary vaccinations were 7,349 including 346 vaccinations at the dispensary. There were 37·2 per mille of population successfully vaccinated, and the percentage of success on the operations was 96·0. I have no small-pox returns. Vaccination here has been, for years back, in a most forward state, and this is the result of the efforts of Colonel Schneider. I am happy to say that the present Political Agent also takes much interest in the progress of vaccination.

93. I conclude my remarks on the Southern circle by saying that there is still room for much progress, which we may reasonably expect will be made gradually in some parts and quickly in the British zilhás.

Progress in the Western circle.

94. The Western circle is superintended by Surgeon Cody;—he has 5 assistants and 50 vaccinators for a population of 3,109,370 and an area of 28,361; so each vaccinator on an average has 62,187 of a population and 567 square miles of an area; the population is a fair average, but the area is too high. The primary vaccinations were 82,790 including 2,861 vaccinations at 18 dispensaries. There were 24·8 per mille of population successfully vaccinated, and the percentage of success on the operations was 95·3. Re-vaccinations only numbered 953. Each vaccinator on an average operated on 1,616 persons, which is below the average for the whole presidency by 212. Each successful vaccination cost 6 annas and 3 pies, or 11 pies above the average. The small-pox deaths were 589 in the British zilhás of Khandesh, Nasik, Thana and Kolábá and in the native state of Penth. The progress in this circle is satisfactory, and there is every probability that the number vaccinated successfully in the current year will be more than 24·8 per mille of population. I am sure the circle could not be in better hands than Dr. Cody's. I visited the superintendent in Tháná and Nasik.

Tháná collectorate.

95. The collectorate of Tháná has a population of 847,424, and an area of 4,052 square miles. There are 11 local fund and 2 municipal vaccinators. Each vaccinator has an average population of 65,184 and 311 square miles—both moderate averages. The primary vaccinations numbered 19,864, including the work done at 9 dispensaries. There were only 21·8 per mille of population successfully vaccinated; but this is a great increase over the preceding year, and the percentage of success on the operations was 94·3, or nearly 3 per cent. higher than in the previous report. Re-vaccinations only reached 88 in number. Each vaccinator's average was 1,431, or 397 below the general average. The deaths from small-pox were 258. There is room for progress, but there is a class of people in this zilhá who have never taken kindly to vaccination.

Kolábá collectorate.

96. The population of Kolábá is 350,405, and the area 1,482 square miles. There are 5 vaccinators, so each has averages of 70,081 and 296 population and square miles respectively—both moderate in extent. Primary vaccinations numbered 8,492, including work at 2 dispensaries; the percentage of success was 95·0, and 22·7 per mille of population were successfully vaccinated. Re-vaccinations amounted to 153 only. Each vaccinator, on an average, operated on 1,691 persons, or 137 below the general average. The deaths from small-pox were 150. Progress here is satisfactory, and the increase of operations, though actually small, is considerable in relation to the extent of population. I went through this zilhá in March last.

Nasik collectorate.

97. The Nasik collectorate is a large one, having 7,180 square miles for a population of 687,353. There are 10 local fund vaccinators and 1 municipal, so each has an average of 62,486 population and 652 square miles. Returns were received from 3 dispensaries. The primary vaccinations were 17,491, or about 2,000 more than in the year preceding, and the percentage of success was 93·2, which is rather low, but still 1·6 higher than in last report. There were 23·0 per mille of population protected, and the re-vaccinations numbered 607. Each vaccinator operated on 1,585 persons on an average, or 243 less than the general average. The deaths from small-pox were 47 only. Progress is satisfactory.

Khandesh collectorate.

98. The Khandesh collectorate is the largest in this presidency, its area being given as 10,162, but it is supposed to be really considerably larger; the population is 1,028,642. There are 16 local fund vaccinators and 1 municipal. There is an area of 597 square miles to each vaccinator, and 60,508 of a population. Including the work at 3 dispensaries, there were 29,341 primary vaccinations, or nearly 3,000 more than in the preceding year, and the success was 97·1, or 1·3 higher than in last report. 27·1 per mille of population were successfully vaccinated: this is the highest rate in the Western circle. Each vaccinator operated on 1,691 persons. Re-vaccinations were only 62. The small-pox deaths reached only 133. The progress is very satisfactory indeed. All things considered, one could hardly find a fault with the vaccination work in this zilhá.

Native states of the Western circle.

99. There are 3 native states in the Western circle, viz., Jawar, Janjira and Penth, in which vaccination has been practised. Vaccination has not yet been introduced into the Dangs. I requested Dr. Cody to see what could be done about giving the people in the Dangs the benefit of vaccination, as I knew that some years ago they had expressed a wish for a vaccinator, but were unable to maintain one themselves. Dr. Cody, in reply, says in his letter No. 67, dated 4th May 1875:—"I have the honour to inform you that I addressed a letter to the Collector of Khandesh, asking more particularly with regard to the Dang states, what steps he would advise taking with a view to introducing vaccination into them.

Vaccination not yet introduced into the Dangs.

"2. In his reply, No. 3028, dated 15th June 1874, he writes:—'An attempt at vaccination may be made in the Dang country, but great tact and patience will have to be exercised. The introduction will probably be very gradual. The inhabitants, though quiet and peaceable, are very wild and uneducated, so reforms must be introduced very gradually and slowly.'

"3. As this reply gave so little encouragement to any proposal for the "maintenance of an establishment, and as I could not well spare a local "fund vaccinator to go into this country to carry on work, I have taken no "further steps in the matter. I shall, however, take the first opportunity of "introducing, at a personal interview with both the collectors of Khandesh "and Nasik, the subject again with a view of ascertaining what likelihood "there may be of the states contributing towards the expense of a vacci- "nator."

Method proposed of introducing vaccination into the Dangs.

100. As far as I know these Dangs are the only places where vaccination is not practised in this presidency. The population is 39,111, and the area 3,840 square miles, so one vaccinator would at least be required. The people are, I believe, very poor; so perhaps Government might give a grant of Rs. 276 a year for the maintenance of a vaccinator, his peon and contingent expenditure. Unless Government do so, I am afraid vaccination can never be introduced into the Dangs. If Government will give the grant, a native of the Dangs could be trained to vaccinate.

Jawar.

101. Jawar has a population of 37,406 and an area of 534. It maintains 1 vaccinator, who operated on 1,903 persons and successfully vaccinated 47·3 per mille of the population. This is a very high rate, and it must be over the birth-rate considerably. There are no small-pox returns.

Janjira.

102. For many years the Sultan of Janjira held out against vaccination, but since the appointment of a vaccinator by His Highness in 1871, vaccination has made wonderful progress, which I believe is a good deal due to Mr. Larcom's influence. The area is 151 miles, and the population 71,996. There are two vaccinators now, but one will be sufficient after the whole of the villages have been once gone over. They vaccinated 4,287, and the percentage of success was 93·8. No less than 54·8 per mille of population were successfully vaccinated. This is the highest rate, except one in the whole presidency, and cannot, of course, be maintained for any length of time. There are no small-pox returns.

Penth.

103. The Penth state has a population of 47,033 and an area of 960 square miles, so the population is thin. There is 1 vaccinator who operated successfully on 26·9 per mille of the population. His total primary vaccinations were 1,361, and there were 51 at the dispensary. The success was 98·3 per cent. on operations. There was only one death from small-pox during the year in the whole state. Progress is very satisfactory.

Progress in Eastern Gujarath circle.

104. Dr. Cola is the superintendent of the Eastern Gujarath circle. It has an area of only 15,939 square miles, and a population of 3,147,853. There are 4 assistant superintendents and 46 vaccinators; returns were also received from 19 dispensaries and 1 jail. There is an average population of 68,431 for each vaccinator, and an area of 346 square miles. The primary vaccinations reached 88,885, and the percentage of success 97·1. There were 27·2 per mille of population successfully vaccinated. Re-vaccinations reached only 1,759. The average number of persons operated on by each vaccinator was 1,872, or 44 above the general average. The cost of each successful vaccination was 4 annas and 11 pies, or 5 pies below the average of the

whole presidency. The deaths from small-pox were 473. Progress is very satisfactory. I only add a few words to say that we must guard against deterioration of the lymph in the rains, and make an example of any vaccinator who is detected working with lymph of bad quality.

Kheda collectorate.

105. The Kheda collectorate has a population of 782,733 in an area of 1,561, so there are 501 persons to the square mile. There are 9 vaccinators—8 local fund, and 1 municipal; and returns were received from 5 dispensaries. Each vaccinator has an average population of 86,970 and 173 square miles. The primary vaccinations were 20,849, and of these 97 per cent. were successful. 25·7 per mille of population were successfully vaccinated. Re-vaccinations numbered only 352, and the percentage of success in them was 58·8. Each vaccinator operated on 2,178 persons on an average, or 350 above the general average. The deaths from small-pox were only 81. Progress is satisfactory.

Panch Mahals.

106. The population of Panch Mahals is 240,743, and the area 1,731 square miles. There are 5 local fund vaccinators, and 1 dispensary officer sent in returns. Each vaccinator has an average population of 48,148, and an area of 346—a small population, but a fair area. The primary vaccinations were 9,726, and the success 97·5. The successfully vaccinated amounted to 39·6 per mille of population, which is, I calculate, about 6 or 7 higher than can be maintained for a series of years. There were 472 re-vaccinations; the average number of persons vaccinated by each vaccinator was 1,939, or 111 above the general average. The deaths from small-pox were only 6. The progress is very satisfactory.

Broach collectorate.

107. Broach is a small collectorate with a population of 350,322 and an area of 1,358. There are 4 local fund vaccinators and 1 municipal, and returns were received from 4 dispensaries. Each vaccinator has an average population of 70,064 and an area of 271. The primary vaccinations reached 9,134, and the success was 98·4. There were 25·4 per mille of the population successfully vaccinated. Re-vaccinations numbered only 40. Each vaccinator operated on 1,709 persons, on an average, or 119 below the average for the whole presidency. The deaths from small-pox were 70. Progress is very satisfactory.

Surat collectorate.

108. In Surat collectorate there is a population of 607,087 and an area of 1,588 square miles. There are 8 local fund vaccinators and 1 municipal; each of the 9 has an area of 176 square miles and a population of 67,454—a moderate population, but a small area. Returns were received from 7 dispensaries and 1 jail. The primary vaccinations amounted to 16,474, and the success was 96·8 per cent. There were 25·9 per mille of population successfully vaccinated. Re-vaccinations numbered 687. On an average each vaccinator operated on 1,749 persons, or 79 less than the general average. There were 316 deaths from small-pox. The progress of vaccination is very satisfactory, but we must insist on the vaccinators keeping their lymph good in the rainy season.

Native states in the Eastern Gujarath circle.

109. The native states in the Eastern Gujarath circle are Mahi Kánthá Rewá Kánthá, Cambay, Dharmpur, Bansda and Sachin.

Mahi Kánthá.

110. Mahi Kánthá has an area of 4,000 square miles and a population of 447,056. There are 5 vaccinators, so each has an average area of 800 square miles and 89,411 of

population. The area is much too large, and the population is a little too high also. The primary vaccinations numbered 9,634 including 221 at the Sadra dispensary. The percentage of success is 97·1, and there were only 20·8 per mille of population protected during the year. Re-vaccinations only numbered 86; no returns of small-pox are received. There is room here for a good deal of progress and extension.

Rewá Kánthá.

111. Rewá Kánthá with a population of 512,569 and an area of 4,736 maintains 10 vaccinators; so each has an average of 51,256 of population and 473 of square miles; returns are received from the dispensary in Baria. The primary vaccinations were 14,067 and the percentage of success 95·8. There were 26·1 per mille of population successfully vaccinated. There were only 97 re-vaccinations. I have no returns of small-pox. The progress here is very good.

Cambay.

112. Cambay state with a population of 83,494 and an area of 350 square miles has 1 vaccinator who primarily operated on 2,660 persons with a success of 98·1 per cent. There were 31·4 per mille of population successfully vaccinated. Re-vaccinations were only 24. Progress is very satisfactory.

Dharmpur.

113. Dharmpur state has a population of 74,592 and an area of 225 square miles. The 1 vaccinator primarily operated on 3,668 persons and obtained 99·2 per cent. of success. There were 48·7 per mille of population successfully vaccinated. This is a very high rate and must decline after vaccination has been practised a few years more and when all the arrears shall have been worked up.

Bansda.

114. Bansda has a population of 32,154 and an area of 321 square miles, and 1 vaccinator primarily vaccinated 2,127, of whom 98·1 per cent. were successful. 66·1 per mille of the population were vaccinated successfully. Vaccination has only been practised here since 1871. The operations were

in	1870-71	89
	1871-72	762
	1872-73	1,457
	1873-74	2,860
	1874-75	2,127
		7,295

Sachin state.

115. The small state of Sachin has only 16 villages, a population of 17,103, and an area of 65 square miles. The Chorasi táluká local fund vaccinator of Surat zilhá does the vaccinations in these villages. In the year under report there were 546 primary vaccinations and 1 re-vaccination. There were 30 per mille of population protected in the year.

116. Dr. Cola has written an interesting account of the introduction and progress of vaccination in these native states, which I here give *in extenso*:—

"The credit of the systematic introduction of vaccination into the native "states of Gujarath is due to Dr. Mahaffy, who was for a lengthened period "superintendent of vaccination in the North-Western Division of Gujarath. "In 1848 Dr. Mahaffy, desirous of carrying out the benevolent intention of "Government with respect to vaccination, suggested to Captain Wallace, the "Political Agent in the Mahi Kánthá, 'the great blessing it would be to the "people in that province if the chiefs would consent to support a couple of "vaccinators to be constantly employed in his districts.' This suggestion "was warmly taken up by the Political Agent, who offered to guarantee the "pay of one vaccinator himself. The scheme, having been submitted to the "Medical Board, was placed before Government and circulars were addressed "in March 1849 to several political officers on the desirability of introducing "vaccination into the native states, in response to which the first steps were "taken and vaccination was commenced in several states. As regards Mahi "Kánthá, Rewá Kánthá and Pálanpur, the following information will not be "altogether uninteresting.

Mahi Kánthá.

"In 1849, on the suggestion of Dr. Mahaffy, the Political Agent succeeded "in inducing the Maharaja of Idar to engage one vac-"cinator for his districts. It was not possible to get "the minor chiefs at once to agree to defray the expenses of another vaccina-"tor, but the Sadra Bazar Fund was at the time rich, and Captain Wallace, "with the sanction of Government, engaged an additional vaccinator who "was paid out of the Bazar Fund for some time till assistance from the minor "chiefs was obtained. The following shows the progress of vaccination for "the few years following the introduction of vaccination :—

"Last 10 months of	1849	...	1,017	Primary vaccinations.
Year	1850	...	1,000	„
Do.	1851	...	4,054	„
Do.	1852	...	5,021	„
"First 9 months of	1853	...	2,634	„

Rewá Kánthá.

"It appears that in reply to the Political Agent's representations only one "chief agreed to entertain a vaccinator. The Raja "of Rájpiplá consented to keep a vaccinator for his "territory on Rs. 18 a month Baroda money. The Chota Udaipur Raja "offered to pay Rs. 5 a month, which was equivalent to a refusal, whereas "all the other chiefs under that Agency declined,—the Rajas of Lunwádá "and Sunth on the ground of poverty, the Raja of Deogad Baria and the "manager of Godhrá on the plea that the people were opposed to vaccination.

Pálanpur.

"The two principal chiefs in this territory, viz., the Diwan of Pálanpur "and the Nawab of Radhanpur, at once and with much "willingness agreed to entertain a vaccinator each in "their territories, and the following was the progress :—

"Pálanpur	1850	Last six months	...	1,595
„	1851		...	3,210
„	1852		...	2,879
„	1853	First six months	...	1,444
"Rádhanpur	1850	Last six months	...	397
„	1851	First four months	...	234
„	1852	June	...	55

" 2. Such were the first steps in the introduction of vaccination in the " three principal native states in the north of Gujarath. The persevering " efforts of the officers of the vaccination department, combined with the " cordial assistance rendered by the political officers, have succeeded in placing " vaccination on a firm and permanent footing everywhere. In Mahi Kántha, " the Idar Darbar now entertains two vaccinators on liberal allowances, and " the minor chiefs all contribute towards the expenses of three vaccina- " tors; in all five vaccinators are employed in this district, and the number " is quite sufficient; but owing to physical and territorial difficulties, vaccina- " tion is still somewhat backward in the eastern and northern parts. In " Pálanpur the diwan sahib employs two vaccinators, the nawáb of Rád- " hanpur one, the petty thakurs contribute to the pay of one vaccinator, " and from the fine fund of the superintendency two vaccinators are paid, " in addition to which one man is paid by Government for camp Dísá and its " environs, making in all 7 vaccinators. There is no difficulty of any kind " in this state, and vaccination is carried on everywhere with ease. The " Rewá Kántha is sufficiently well provided with vaccinators, there being in all ten men, and vaccination is progressing well (marginally noted) in all the states which are under the immediate control of the agency. The Chotá Udaipur and Rájpiplá states are ruled by independent princes, and vaccination in these states is not so good, nor so extended, owing to the want of cordiality and support of the darbárs to the vaccina- " tors; partly also it is owing to the inefficiency of the men employed, but " it is hoped that, with time, these difficulties will be got over.

Rájpiplá, 2 vaccinators.
Báriá, 2 „
Chotá Udaipur, 2 „
Sunth & Kadáná, 1 „
Bálásinur, 1 „
Sankheda Mewas, 1 „
Lunwada, 1 „

" 3. As regards the willingness of the people of these states to sub- " mit to vaccination, there is not much to be said. In Mahi Kántha all the " settled, cultivating and trading classes avail themselves of vaccination " readily; difficulty is experienced only with the unsettled wandering Bhils, " inhabiting the eastern and northern parts; but among these, too, vaccina- " tion has of late much progressed, and there are only a few villages situated " on the borders of Dungarpur, Mewád, Wágud and Udaipur, where the " Bhils have objected to vaccination. In Pálanpur, with the exception of " the Mahomedan population of Pálanpur and Rádhanpur kasbas, the " people of this district take kindly to vaccination. The principal classes " are the Anjaná cultivators and the Koli thakurdas; both these accept " vaccination, the latter people perhaps reluctantly. In Rewá Kántha " vaccination is accepted by all classes pretty freely, with the exception of the " Bhils of Chotá Udaipur and Rájpiplá."

Progress in the Western Gujarath circle.

117. The Western Gujarath circle is superintended by Surgeon-Major Blomfield. The area and population cannot be given correctly for each vaccinator's charge in Kathewád, but the population for the whole circle is about 3,644,852, and the area 30,224 square miles. There are 3 assistant superintendents, 2 of whom are in Kathewád, and 1 in Ahmadábád collectorate. I am sorry to say there is no assistant superintendent in Pálanpur state, where there are 7 vaccinators. It would certainly be of great benefit, if H. H. the Maharaja of Pálanpur would appoint an assistant superintendent, especially as the vaccinators have not been visited by the superintendent in the last two years. As Dr. Blomfield found so much to do in Kathewád, he had not time to go into Pálanpur territory. The number of vaccinators is 53, so each has an

average proportion of 68,770 of population and 570 square miles. The primary vaccinations numbered 113,928, of which 2,937 were returned by 14 dispensaries and 1 jail, and the percentage of success was 95·9. There were 29·0 per mille of population successfully vaccinated. The re-vaccinations were 2,614. Each vaccinator averaged 2,141 persons, or 313 above the general average. The cost of each successful vaccination averaged only 3 annas and 9 pies, or 1 anna 7 pies less than the general average. I have no returns for Kathewád and Pálanpur regarding small-pox, but the deaths in Ahmadábád zilhá were 388, 165 of which were in the Dhanduka táluká alone. As we have now another vaccinator in that very large táluká, I trust the deaths from this disease will not be so many again. The progress in this circle is very satisfactory, but I regret to add that it was tarnished by ten instances of falsification of registers.

Ahmadábád collectorate.

118. The population of Ahmadábád collectorate is 829,637, and the area 3,844 square miles. There are 7 local fund vaccinators and 5 municipal, and returns were received from 6 dispensaries. Each vaccinator has an average population of 69,136, and an area of 320 square miles. The primary vaccinations numbered 22,998, and the percentage of success 95·5. There were 25·7 per mille of population primarily vaccinated successfully. Re-vaccinations were 1,930. I have already said that there were 388 deaths from small-pox. Progress in this zilhá is very satisfactory.

Kathewád.

119. The population of Kathewád is 2,312,629, and the area 20,339. There are 33 vaccinators maintained by the chiefs and 1 by Government. The latter is in Rajkot camp. Each vaccinator has an average population of 68,018, and an area of 598 square miles. The average population is moderate, but the area is high. The primary vaccinations numbered 77,311, and the percentage of success was 96·1. There were 31·1 per mille of population successfully vaccinated primarily. Re-vaccinations were 1,222. Each vaccinator on an average operated on 2,253, or 425 above the average for the whole circle; but I regret to add that ten of the vaccinators were found to have falsified their registers, but in nearly all cases to such a very small extent, that I am compelled to doubt there having been *much* intentional or criminal falsification. There are 8 dispensaries and 1 jail in Kathewád, from which returns were received. The progress in Kathewád is very good, and I doubt not but Dr. Blomfield will soon suppress all falsifications.

Pálanpur states.

120. The area of the states of Pálanpur is 6,041 square miles, and the population 502,586. There are 6 vaccinators maintained by these states and 1 by Government for the camp of Dísá. Each vaccinator has an average population of 71,798 and 863 square miles; the area is very large, but the population is moderate. The primary vaccinations reached 13,612, and the percentage of success was 96·0. There were 24·8 per mille of population protected in the year. Re-vaccinations only numbered 2. The progress is very good.

Progress in Sindh circle.

121. The Sindh circle is under the superintendence of Surgeon Williams. He has 6 assistant superintendents, but only 5 were employed for the greater part of the year. There are 50 vaccinators, of whom 5 are municipal, 2 are paid by native states, and 43 by local funds, and vaccination is carried on at 19 dispensaries. The population is 2,322,755, and the area 49,306 square miles, so

each vaccinator has an average of 46,455 of population, and 986 of square miles. The average population is small, but the area is very high. The number of primary vaccinations was 94,263, and the percentage of success 98·2. There were 39·1 per mille of population primarily vaccinated successfully. Re-vaccinations reached 48,504, or more than all the other circles put together. The success in re-vaccinations was 85·9. Each vaccinator, on an average, vaccinated or re-vaccinated 2,790, or 962 above the general average for the whole presidency. The cost of each successful vaccination was 4 annas 2 pies, or 1 anna 2 pies below the average. There were only 31 deaths returned for small-pox, and even of this small number, Dr. Williams thinks, some were not deaths from small-pox at all, but from measles; but to counter-balance this, he says all the deaths from small-pox have not been registered. I visited this circle in September.

Karáchi.

122. The population of Karáchi collectorate is 423,495, and the area is 14,091. The vaccinators numbered 10—9 local fund, and 1 municipal. Each of the ten has an average population of 42,349, and of area 1,409 square miles. The population is small, but the area very large for each to get over; but Kohistan has almost no population. The primary vaccinations numbered 18,032, including work done at 8 dispensaries, and the percentage of success was 97·8. There were 40·9 per mille of the population protected during the year. Re-vaccinations reached 5,218. Each vaccinator on an average operated on 2,225 persons or 397 above the average. Only 18 deaths reported from small-pox. The progress here is all that can be desired.

Haidrabad collectorate.

123. The collectorate of Haidrabad has a population of 721,947, and an area of 9,052 square miles. There were 12 local fund vaccinators and 1 municipal, and returns were received from 4 dispensaries. Each vaccinator has an average population of 55,534 and an area of 696 square miles. The population is small, but the area large. The primary vaccinations were 23,464, and the percentage of success was 98·3. There were 31·8 per mille of population protected by primary vaccination. Re-vaccinations were 17,444, and the success among them is returned as no less than 90·6. Each vaccinator operated on 3,096 persons on an average; this is 1,268 above the general average. There was only 1 death from small-pox reported. The progress here leaves nothing to be desired.

Shikarpur collectorate.

124. The Shikarpur collectorate has a population of 776,227 to an area of 8,813. There are 13 local fund vaccinators and 3 municipal. So each has a population of 48,514 and an area of 550 square miles on an average. The former sum is small, but the latter large. Returns were received from 2 dispensaries. The primary vaccinations reached 29,058, the percentage of success in them was 98·7. There were 35·9 per mille of population protected by primary vaccination. The re-vaccinations were 14,565, or half as many as there were primary operations. The percentage of success was reported to be 92·6. Each vaccinator on an average vaccinated 2,699, or 871 above the general average. The deaths from small-pox only numbered 5. The progress is perfectly satisfactory.

Thar Parkar district.

125. The Thar Parkar is mostly a desert; it has a population of 180,761 in an area of 12,729, or only 14·2 persons to the square mile. The vaccinators numbered 6 and are paid from local funds, and vaccination is practised at 4 dispensaries. The

primary vaccinations numbered 10,371, and of these 97·7 per cent. were successful. There were 54·5 per mille of population protected by primary vaccination. Re-vaccinations numbered 9,694 and the percentage of successful in them was 65·2. The average number of persons operated on by each vaccinator was 3,167, or 1,339 above the general average. The deaths from small-pox were only 5. Progress is satisfactory, but I do not think the primary vaccinations can possibly be kept as high as last year for any length of time.

Upper Sindh Frontier District.

126. The Frontier district of Upper Sindh has a population of 89,985 and an area of 1,913 square miles. There are 3 local fund vaccinators, so each has an average of 29,995 of population and 637 square miles; the population is very small but the area is large. The primary vaccinations numbered 3,599 and the percentage of success in them was 99·1. There were 39·7 per mille of population protected. Re-vaccinations numbered 1,322, and the percentage of success was 98·4, or nearly as high as in primary vaccinations. Each vaccinator, on an average, vaccinated 1,640 persons, or 188 less than the general average. 2 deaths only occurred from small-pox. The progress here is satisfactory.

Khairpur native state.

127. His Highness Mir Ali Murad's territory has a population of 130,350 souls and an area of 2,708 square miles. His Highness keeps 2 vaccinators. They primarily vaccinated 9,536 persons and re-vaccinated 163. The percentage of success in the former was 97·5 and 81·8 in the latter. There were 69·1 per mille of population protected by primary vaccination. This high rate could only be reached by vaccinating many grown up boys and girls, if not actually young adults. It is the highest recorded.

Progress in Baroda circle.

128. The Baroda territory extends to about 4,400 square miles and has a population of 2,000,225, so there are about 450 souls to the square mile. H. H. the Gaikawad maintains 1 assistant superintendent and 23 vaccinators, and the whole is administered by the residency surgeon of Baroda. Each vaccinator has an average area of 191 square miles and a population of 86,966—the latter is rather high and the former low. The primary vaccinations were 29,622 and the percentage of success 93·2. There were only 13·2 per mille of population successfully vaccinated in the year under report, or less than half what might easily be obtained were the superintendence efficient. There were only 173 re-vaccinations. Each vaccinator operated on only 1,295 persons on an average, which is 533 below the general average of the department. The cost was 4 annas and 2 pies for each successful case, or 1 anna and 2 pies less than the general average. No returns of small-pox are received.

Baroda vaccinators should be superintended by Drs. Cola and Blomfield.

129. I am of opinion that most of the Baroda territory should be under the superintendence of Dr. Cola, the superintendent of vaccination in the Eastern Gujarath circle, and that part of the Gaikawadi territory which lies in Kathewad should be superintended by Dr. Blomfield, superintendent of the Western Gujarath circle. If these officers had the superintendence, I am perfectly sure that vaccination would soon progress satisfactorily in H. H. the Gaikawad's territory.

130. H. H. the Rao's territory extends to 6,500 square miles and has a population of 487,305. There is 1 assistant superintendent, and there are 11 vaccinators maintained by H. H. and by the Bhayads. Over the whole, the medical officer of H. H.'s hospital in Bhuj, Mr. Dorábji Hormasji, exercises a kind of supervision. Each vaccinator has an average area of 590 square miles and a population of 44,300, but really the vaccinators work in very limited populations and areas, and little or no attempt has ever been made systematically to vaccinate over the whole country. The primary vaccinations numbered only 3,025 and the percentage of successful was 93·9. There were only 5·7 per mille of the population vaccinated successfully in the year 1874-75, whereas there might have been six times as many. Each vaccinator on an average only operated on 275 persons, while the average for the department as a whole in Bombay Presidency is 1,828. The cost was 14 annas and 8 pies for each successful case, or 9 annas and 4 pies above the general average. Vaccination is very backward in Kutch, and if any real wish exists for the benefits of vaccination, H. H. the Rao's vaccination establishment should be placed under the superintendence of the superintendent of vaccination in Western Gujarath circle. If this were done I would guarantee that the progress of vaccination would soon be as good as in British circles. H. H.'s establishment is too small to require a superintendent all to itself, and the cost of one would run up the cost of vaccination even higher than it is already; but if H. H. will place his establishment under Dr. Blomfield, and give that officer a small allowance for the charge, I have not the least doubt but the greater amount of work would amply repay H. H. and be an immense boon to his subjects.

Progress of vaccination in Kutch.

131. When I returned to India from furlough in 1873 I found on the records of my office Her Majesty's Secretary of State for India's despatch No. 4 (Sanitary) dated India Office, London, 26th March 1872, in which the Army Sanitary Commission recommended that the vaccination department should be utilized in the general sanitation of this presidency, and the Duke of Argyll, in the despatch, said in reference to this, "I commend to the particular "attention of your Excellency in Council the views expressed in the latter "part of the paper received from the Commission."

In my previous report I drew attention to the despatch, and stated my conviction that the vaccination department might aid in the general sanitation of the country without injuring the efficiency of the vaccination department, and since then Government has been pleased to issue the following orders:—

"No. 664 of 1875.

"*Bombay Castle, 4th March* 1875.

"With a view to the improvement of Sanitary Administration generally, "His Excellency the Governor in Council is pleased to direct that the following orders shall apply on and after the 1st April 1875:—

"1. Superintendents of Vaccination are to be the Health Officers of "their respective Districts, and in all that pertains to their duty as Health "Officers they will be under the Sanitary Commissioner.

"2. When on tour they will take every opportunity of inspecting "Birth and Death registers, and of giving such advice as may be necessary "with regard to them.

" 3. They will advise generally on local sanitary matters, more especially " with regard to surface conservancy, ordinary surface and subsoil drainage, " and the conservation of tanks, wells and other sources of water supply.

" 4. As regards Epidemics, they will advise general precautionary mea- " sures, and try to find out their distinguishing characteristics, their causes " and their course.

" 5. In all that relates to their duty as Health Officers they will commu- " nicate direct with the Sanitary Commissioner and with local authorities.

" 6. Assistant Superintendents and Vaccinators will also inspect the " registers and report to their Departmental Superiors as to how they are " kept. Assistant Superintendents will advise Patels and others as to ordi- " nary village cleanliness, will look at wells, tanks, &c., and report generally " what attention is paid to simple matters of conservancy.

" 7. Neither the Superintendents nor their subordinates are to do " more than advise, and they will confine their advise (the latter especially) " to such simple matters as are within the reach of the people, or which " involves no outlay beyond the means of those advised.

" 8. The Birth and Death registers will be kept by the present agency " (Kulkarnis and others), but all entries are to be made in Register Books, " which will be prepared under the orders of Government, and no change is " to be made in them without the sanction of Government.

" 9. As suggested by the Surgeon General, the Sanitary Commissioner " should, in conjunction with the Superintendent General of Vaccination, " draw up such general rules or directions relating to the matters above re- " ferred to, as will enable the Superintendents of Vaccination to familiarize " themselves with the kind of work expected of them, and also afford them " the means of instructing their subordinates, the more intelligent of whom " may be expected to become useful assistants in Sanitary work."

I feel certain this step will in a short time obtain for the sanitary department more correct figures regarding life and death ; but until the vital statistics are in the hands of the health officers the progress in respect to correctness will be limited. I have, in a memorandum now before Government, expressed my views on the whole subject of the union of the sanitary and vaccination departments, but as it is still under consideration I can only just allude to the matter here.

J. PINKERTON, M.D., Surgeon-Major,
Superintendent General of Vaccination, Bombay Presidency.

Bombay, 24th May 1875.

TABLES

OF

VACCINATION RETURNS, &c.,

FOR

1874-75.

ABSTRACT of the Vaccination Statements of

1	2		3		4	5	6		
Establishment.	Number of vaccinators.		Total number of persons vaccinated and re-vaccinated.		Square miles.	Population of area included in last column.	Primary vaccination. A. Successful.	B. Unsuccessful including those doubtful.	C. Unknown.
	1874-75.	1873-74.	1874-75.	1873-74.					
Government	2	2	4,838	4,380	...	74,819	4,365	103	64
Municipal	51	48	60,000	59,116	...	1,636,394	51,162	2,137	2,050
Local Funds	203	202	427,658	368,053	123,590	13,638,578	361,689	10,893	8,403
Native States	129	125	211,656	191,331	64,254	8,648,479	195,729	8,352	6,815
Dispensaries	...	...	21,192	19,989	...	964,198	17,463	1,410	707
Army ... ... European ...	...	...	728	1,122	...	14,529	728	...	...
Army ... ... Native ...	4	4	6,552	8,232	...	100,571	4,846	449	64
Administration and Superintendence Charges	...	...	...	...	...	...	...	...	...
Total...	389	381	732,624	652,223	187,844	25,077,568	635,982	23,344	18,103

Details of column 3.

Total number of persons vaccinated	732,624
Deduct persons re-vaccinated	60,807
Number of persons primarily vaccinated ...	671,817

Details of Pri

Total number of operations	
Deduct excess of operations	
Number of persons vaccinated	

Figures, showing the Work by Establishments.

		7					8		9	10	11
nations.		Re-vaccinations.					Percentage of successful cases excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.	Amount expended.	Cost of each successful case.
D.	E.	A.	B.	C.	D.	E.					
Total.	Excess of operations over persons.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.			
										Rs. a. p.	Rs. a. p.
4,532	15	244	74	3	321	...	97·6	76·7	2,419	.....	...
55,349	539	3,326	1,410	527	5,263	73	95·9	70·2	1,176	15,686 14 0	0 4 7
380,985	3,427	39,035	7,286	3,910	50,231	131	97·0	84·2	2,106	59,753 8 11	0 2 4
210,896	1,207	1,352	477	146	1,975	8	95·9	73·9	1,640	37,778 2 7	0 3 1
19,580	187	1,004	714	180	1,898	99	92·5	58·4	...	.....	...
728	...	...	...	...	...	...	...	...	...	.....	...
5,359	237	657	814	23	1,494	64	91·5	44·6	..	.....	...
...	...	...	...	...	...	...	...	...	...	107,444 12 3	...
677,429	5,612	45,618	10,775	4,789	61,182	375	96·4	80·8	1,828	220,663 5 9	0 5 4

mary Vaccinations.

(column 6 D.)	677,429
over persons (column 6 E.)	5,612
... ...	671,817

Details of Re-vaccinations.

Total number of operations (column 7 D)	61,182
Deduct excess of operations over persons (column 7 E)...	375
Number of persons re-vaccinated	60,807

STATEMENT No. I., showing particulars of Vaccination in each Circle

1	2	3		4		5		6		7	8					
												Primary				
												A.		B.		
												Sex.		Caste		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.									
Presidency Circle.	Anantá Chandrobá, Assistant Surgeon.			1		380	359	City of Bombay.	19	16,601	Kolábá	158	142	33	201	7
					1	365	415			2,363	Fort, South ...	196	160	28	62	21
						397	311			29,732	Fort, North ...					
				1						10,464	Esplanade ...	169	158	13	38	9
						572	670			43,198	Market ...	307	238	8	369	122
				1	1	538	267			35,100	Mándví ...	275	262	3	402	60
						381	643			36,748	Chakhlá ...	199	143	...	89	212
				1	1	1,008	1,281			49,873	Umbarkhádi ...	232	194	29	229	118
						1,296	770			25,556	Dongari ...	702	583	1	1,022	134
				1		676	707			37,915	Dhobí Taláo ...	386	280	111	345	11
				1	1	308	230			20,760	Phanas Wádi ...	161	142	7	278	4
				1		746	1,061			36,029	Bhuleshwar ...	440	250	7	361	262
				1		474	594			23,638	Khárá Tálao ...	258	185	6	159	197
					1	593	367			27,594	Kumbhár Wadá ...	286	304	3	507	20
				1		844	870			21,234	Khetwadi ...	454	388	12	599	65
				1		870	460			24,817	Girgaum ...	493	369	53	733	22
					1	143	145			7,531	Chowpáti ...	75	67	5	108	5
				1		250	185			7,741	Wálkeshwar ...	148	96	19	198	2
						326	172			4,317	Mahálakshumí ...	199	125	11	275	3
				1	1	623	537			20,973	Mázágaon ...	336	267	67	420	36
						147	143			10,083	Tád Wádí ...	93	52	7	107	21
				1	1	1,122	1,145			46,996	Kámáthípurá ...	455	630	41	648	191
				1		783	1,029			28,032	Byculla ...	149	140	31	177	17
				1	1	686	481			13,773	Parel ...	384	300	24	569	30
						154	80			4,460	Shiwrí ...	88	66	1	135	8
						241	260			11,572	Sion ...	171	70	27	203	8
				1	1	500	521			14,310	Máhim ...	308	192	67	397	21
						142	70			10,042	Warli ...	99	43	2	133	5
				...	1	64	29			22,953	Harbour ...	33	1	2	...	32
						78	105			.....	Out Stations ...	18	26	31	8	3
Total of Presidency Circle.		...	...	16	11	14,707	13,907		19	644,405		7,272	5,873	649	8,772	1,646

DEPARTMENT.

of Superintendence, in the Bombay Presidency, during the Year 1874-75.

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.	Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
4	55	204	96	293	17	...	310	10	32	52	...	84	4	94·5	38·0	745
234	11	231	125	344	32	5	381	25	5	2	2	9	...	91·4	71·4	
3	264	218	109	313	19	3	335	8	56	13	1	70	...	94·2	81·1	969
22	24	370	175	520	13	16	549	4	3	2	22	27	...	97·5	60·0	
...	72	330	207	507	28	5	540	3	...	...	1	1	...	94·7	...	919
18	23	213	129	336	2	5	343	1	16	6	17	39	...	99·4	72·7	
1	49	267	159	386	36	5	427	1	252	250	85	587	5	91·4	50·1	2,304
1	127	814	471	1,218	60	12	1,290	5	1	...	10	11	...	95·3	100	
140	59	452	214	621	44	14	679	13	9	...	1	10	...	93·3	100	676
12	2	226	77	285	20	...	305	2	4	1	...	5	...	93·4	80·0	308
10	50	452	238	674	10	8	692	2	30	2	24	56	...	98·5	93·7	746
5	76	293	150	420	15	8	443	....	2	1	30	33	2	96·5	66·6	1,067
...	60	425	165	552	31	16	599	9	1	...	2	3	...	94·6	100	
58	108	562	280	808	24	11	843	1	1	...	1	2	...	97·1	100	844
37	17	610	252	823	45	8	876	14	2	...	6	8	...	94·8	100	1,013
17	7	99	43	139	7	...	146	4	...	...	1	1	...	95·2	...	
6	19	169	75	227	24	2	253	9	3	3	...	6	...	90·4	50·0	576
7	28	259	65	309	9	10	328	4	2	...	...	2	...	97·1	100	
10	70	392	211	577	23	11	611	8	10	5	7	22	2	96·1	66·6	770
...	10	101	44	129	12	4	145	...	...	1	1	2	...	91·4	...	
2	203	661	424	1,043	36	9	1,088	3	6	5	26	37	...	96·6	54·5	1,122
2	62	158	131	268	22	4	294	5	239	249	6	494	...	92·4	48·9	783
10	51	499	185	670	28	2	700	16	...	1	1	2	...	95·9	..	840
...	10	111	43	148	15	...	163	9	...	...	...	...	...	90·7	...	
...	3	177	64	232	21	...	253	12	...	...	...	...	...	91·6	...	883
13	2	327	173	463	50	1	514	14	...	...	...	...	...	90·2	...	
2	...	87	55	139	1	3	143	1	...	...	...	...	...	99·2	...	
...	...	2	32	24	1	9	34	...	2	...	28	30	...	96·0	...	...
2	...	25	19	14	...	30	44	...	24	3	7	34	...	100	88·8	
616	1,462	8,734	4,411	12,482	645	201	13,328	183	700	596	279	1,575	13	95·0	54·0	919

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Number and rank of superintendent.	Number of native superintendents		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.									
Central Circle.	P. S. Turnbull, M.D., Surgeon-Major; Officiating, J. Pinkerton, M.D., Surgeon-Major.			1	1	3,236	2,984	Puná Collectorate.	766	155,082	Hawelí ...	1,607	1,629	....	2,755	57
				2	2	2,567	1,605		4	90,436	Puná City ...	1,528	1,018	40	1,858	262
									4	28,450	Do. Cantonment.*					
				1	1	1,620	1,547		357	56,834	Máwal ...	793	827	4	1,652	20
		1	1	2	2	2,272	1,582		799	139,152	Khed ...	1,158	1,114	...	2,153	37
				1	2	1,736	1,668		600	106,876	Juner ...	866	870	...	1,481	125
				1	1	2,117	1,792		442	75,732	Purandhar ...	1,095	1,022	...	1,774	37
				1	1	1,643	778		558	76,984	Sirúr ...	843	800	...	1,379	84
				1	1	1,628	1,397		567	62,392	Indápur ...	812	816	...	1,444	54
				1	1	1,657	1,736		1,002	115,297	Bhimthadi ...	842	815	...	1,369	47
		1	1	11	12	18,476	15,089		5,099	907,235		9,544	8,911	41	15,565	723
				2	2	3,273	3,296	Ahmadnagar Collectorate.	548	105,905	Nagar ...	1,712	1,560	51	2,613	228
									...	3,983	Do. Cantonment.*					
				1	1	2,519	2,718		469	59,093	Ráhurí ...	1,252	1,267	19	1,861	153
				1	1	2,015	1,019		731	82,422	Párner ...	930	1,084	2	1,628	82
				1	1	1,875	1,160		610	64,936	Shrígundí ...	962	913	1	1,491	64
		1	1	1	1	1,942	1,689		567	48,766	Karjat ...	988	954	....	1,549	82
				1	1	1,733	1,908		621	62,418	Newásá ...	872	861	13	1,331	88
				1	1	2,023	1,440		676	60,591	Ankolá ...	997	1,026	...	1,767	46
				1	1	2,072	1,786		550	72,994	Jámkhed ...	1,074	998	...	1,796	116
				1	1	1,465	1,556		505	60,839	Kopargáon ...	700	765	...	1,135	44
				1	1	2,296	2,035		688	68,765	Sangamner ...	1,170	1,126	...	1,922	73
				1	1	3,001	1,425		682	83,226	Siogáon ...	1,500	1,495	...	2,423	185
		1	1	12	12	24,214	20,032		6,647	773,938		12,157	12,049	86	19,516	1,161
				2	2	3,993	3,765	Sholápur Collectorate.	841	180,587	Sholápur ...	2,143	1,850	20	2,899	595
				1	1	2,216	1,563		613	103,981	Mádhe ...	1,168	1,048	...	1,937	84
				1	1	2,053	2,027		762	105,291	Karmálá ...	1,029	1,024	...	1,712	73
		1	1	2	2	3,360	2,909		455	79,314	Pandharpur ...	1,668	1,680	...	2,628	139
				1	1	1,800	1,408		648	62,960	Sángolá ...	895	905	...	1,428	47
				2	2	3,327	2,329		606	130,853	Bársi ...	1,657	1,670	3	2,648	161
		1	1	9	9	16,749	14,001		3,925	662,986		8,560	8,177	23	13,252	1,099
				2	2	3,568	3,518	Sátárá Collectorate.	321	115,113	Sátárá ...	1,908	1,641	12	3,103	187
				...	...	...	...		5	4,006	Mahábleshwar ...	...	...	...	...	...
				1	1	1,914	1,812		324	87,975	Tásgáon ...	991	923	...	1,588	133
				1	1	2,966	1,961		433	59,836	Jawalí ...	1,536	1,421	...	2,649	18
				1	1	2,145	1,632		389	86,095	Waí ...	1,094	1,044	...	1,784	45
				1	1	2,203	1,609		500	81,950	Khatáw ...	1,110	1,090	...	1,833	48
		2	1	1	2	2,956	4,408		551	156,089	Wálwa ...	1,519	1,437	...	2,478	92
				1	1	1,575	1,332		627	62,198	Mán ...	782	793	...	1,338	26
				1	2	2,593	3,378		393	133,122	Karhád ...	1,317	1,276	...	2,252	51
				1	1	1,870	1,869		510	76,783	Khánápur ...	965	905	...	1,601	83
				1	1	3,488	2,684		409	115,491	Pátan ...	1,763	1,719	...	2,919	54
				2	2	2,699	2,420		574	55,048	Málsiras ...	1,316	1,362	...	2,095	104
				1	1	2,453	2,138		342	82,344	Korégáon ...	1,242	1,198	...	1,959	66
		2	1	14	16	30,430	28,761		5,378	1,116,050		15,543	14,809	12	25,599	907

* Work shown in

9									10					11		12
Vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.	Percentage of successful cases, excluding those "unknown" from the total.		
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	424	1,063	2,173	3,214	21	10	3,245	9	...	...	...	...	...	99·3	...	3,236
12	374	1,839	707	1,698	149	699	2,546	...	8	9	4	21	...	92·0	47·0	1,283
...	247	517	1,103	1,580	29	11	1,620	...	...	...	...	...	...	98·1	...	1,620
...	82	1,097	1,175	2,079	100	93	2,272	...	...	...	...	...	...	95·4	...	1,136
...	130	1,104	632	1,678	25	34	1,737	1	...	...	...	...	...	98·5	...	868
...	306	1,016	1,101	1,876	151	97	2,124	7	...	...	...	...	...	92·5	...	2,117
1	179	695	948	1,638	7	...	1,645	2	...	...	...	...	...	99·5	...	1,643
...	130	647	981	1,564	122	...	1,686	58	...	...	...	...	...	92·7	...	1,628
...	241	623	1,034	1,482	163	19	1,664	7	...	...	...	...	...	90·0	...	1,657
13	2,113	8,601	9,854	16,809	767	963	18,539	84	8	9	4	21	...	95·6	47·0	1,539
1	379	1,938	1,334	3,221	23	31	3,275	3	1	...	...	1	...	99·2	100	1,636
...	486	1,896	623	2,494	21	11	2,526	7	...	...	...	...	...	99·1	...	2,519
...	302	579	1,435	1,945	31	42	2,018	4	1	...	...	1	...	98·4	100	2,015
...	319	815	1,060	1,730	32	113	1,875	...	...	...	...	...	...	98·1	...	1,875
...	311	1,482	460	1,888	26	42	1,956	14	...	...	...	...	...	98·6	...	1,942
...	301	1,200	533	1,681	38	27	1,746	13	...	...	...	...	...	97·7	...	1,733
...	210	988	1,035	1,953	43	27	2,023	...	...	...	...	...	...	97·8	...	2,023
...	160	1,249	823	2,047	27	...	2,074	2	...	...	...	...	...	98·6	...	2,072
...	286	615	850	1,426	41	...	1,467	2	...	...	...	...	...	97·2	...	1,465
...	301	1,180	1,116	2,180	74	42	2,296	...	...	...	...	...	...	96·7	...	2,296
...	387	1,042	1,953	2,959	36	1	2,996	1	4	2	...	6	...	98·7	66·6	3,001
1	3,442	12,984	11,222	23,524	392	336	24,252	46	6	2	...	8	...	98·3	75·0	2,017
...	479	1,866	2,127	3,754	36	203	3,993	...	...	...	...	...	...	99·0	...	1,996
...	195	1,185	1,031	2,160	51	14	2,225	9	...	...	...	...	...	97·6	...	2,216
...	268	922	1,131	1,928	141	72	2,141	88	...	...	...	...	...	93·1	...	2,053
...	581	2,139	1,209	3,195	101	67	3,363	15	8	4	...	12	...	96·9	66·6	1,680
...	325	1,263	537	1,672	181	3	1,856	56	...	...	...	...	...	90·2	...	1,800
...	515	1,708	1,619	3,199	89	66	3,354	27	...	...	...	...	...	97·2	...	1,663
..	2,363	9,083	7,654	15,908	599	425	16,932	195	8	4	...	12	...	96·3	66·6	1,861
...	247	1,820	1,729	3,418	128	52	3,598	49	12	3	4	19	...	96·3	80·0	1,784
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	193	1,366	548	1,906	5	3	1,914	...	...	...	...	...	...	99·7	...	1,914
...	290	669	2,288	2,925	23	12	2,960	3	8	...	1	9	...	99·2	100	2,966
...	309	1,165	973	2,115	34	16	2,165	27	5	2	...	7	...	98·4	71·4	2,145
...	319	946	1,254	2,158	21	21	2,200	...	3	...	...	3	...	99·0	100	2,203
...	386	895	2,061	2,941	3	12	2,956	...	...	...	..	...	...	99·8	...	2,956
...	211	284	1,291	1,574	...	1	1,575	...	...	...	...	...	...	100	...	1,575
...	290	1,388	1,205	2,487	84	63	2,634	41	...	...	...	...	...	96·7	...	2,593
...	186	1,196	674	1,845	39	..	1,884	14	...	...	...	...	...	97·9	...	1,870
...	509	651	2,831	3,377	55	61	3,493	11	4	2	...	6	..	98·3	66·6	3,488
...	479	1,696	982	2,579	74	35	2,688	10	13	7	1	21	...	97·2	65·0	1,349
...	415	1,108	1,332	2,298	51	137	2,486	46	11	2	...	13	...	97·8	84·6	2,453
...	3,834	13,184	17,168	29,623	517	413	30,553	201	56	16	6	78	...	98·2	77·7	2,173

Army Returns.

1	2	3		4		5		6		7	8						
Circle.	Number and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary A. Sex.		Primary B. Caste		
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.					Males.	Females.	Christian.	Hindu.	Musalman.
Central Circle—*concluded.*	P. S. Turnbull, M.D., Surgeon-Major, Officiating.—John Pinkerton, M.D., Surgeon Major.	1	1	1	1	2,568	2,563	Ratnagiri Collectorate.	381	119,741	Rátnágiri ...	1,287	1,272	1	2,081	208
				2	2	6,085	7,886		744	163,930	Chiplún ...	2,982	3,011	...	5,126	391
				1	1	2,574			395	89,647	Khed ...	1,183	1,195	...	1,752	190
				1	1	2,660	2,960		500	143,137	Dápuli ...	1,310	1,288	...	1,993	282
				1	1	2,952	5,687		508	118,921	Deogarh ...	1,516	1,415	10	2,679	11
				2	2	4,713	4,249		108	123,273	Málwan ...	2,220	2,132	65	3,982	21
				2	2	4,049	8,248		785	168,498	Rájápur ...	2,079	1,937	10	3,848	43
				1	1	2,457	2,372		447	91,989	Sangameshwar ...	1,235	1,186	...	2,085	53
		1	1	11	11	28,058	33,965		3,868	1,019,136		13,812	13,436	86	23,546	1,199
				1	1	1,805	1,414	Native States	498	81,068	Akalkot ...	966	839	...	1,306	227
				2	1	1,945	1,511		1,491	136,075	Bhor ...	967	978	...	1,817	6
		...	...	1	1	1,554	1,098		*770	*70,665	Jat ...	757	797	...	1,367	101
				1	1	1,615	387		213	68,335	Atpadi ...	799	816	...	1,371	62
				1	1	1,229	1,082		397	59,124	Phaltan ...	637	592	...	1,025	30
		...	...	6	5	8,148	5,492		3,369	415,267		4,126	4,022	...	6,886	426
Total of Central Circle.		6	5	63	65	126075	117340		28,286	4,894,612		63,742	61,404	248	104364	5,5 15
Southern Circle.	J. Raby, Surgeon.	1	1	2	2	3,166	3,156	Belgaum Collectorate.	605	129,291	Belgáum ...	1,667	1,453	103	2,631	256
									3	5,330	Do. Cantonment					
				1	1	2,424	1,935		409	131,504	Sampgáon ...	1,253	1,167	...	2,199	207
				1	1	1,790	1,825		638	120,691	Parasgarh ...	926	858	...	1,636	123
				2	2	2,172	2,254		668	109,697	Gokák ...	1,116	1,056	...	1,946	148
				2	2	3,446	3,608		848	248,685	Chikodí ...	1,768	1,678	1	2,978	287
				1	1	2,151	1,480		632	78,875	Bidí ...	1,124	1,024	54	1,933	118
				1	1	1,013	752		789	114,677	Athní ...	539	470	...	908	87
		1	1	10	10	16,162	15,010		4,592	938,750		8,393	7,706	158	14,231	1,226
				2	1	3,368	2,271	Dharwad Collectorate.	460	123,730	Dhárwád ...	1,684	1,670	36	2,756	470
				1	1	1,724	1,291		565	104,700	Nawalgund ...	885	839	...	1,553	162
				1	1	2,034	1,976		341	83,175	Bankápur ...	771	661	...	1,283	133
				1	1	2,408	2,706		298	67,390	Hángal ...	1,259	1,134	...	1,941	336
				2	2	3,291	2,090		310	101,238	Hubli ...	1,668	1,562	3	2,555	615
		1	1	1	1	728	424		404	86,601	Ránibednur ...	385	343	...	629	96
				1	1	962	1,004		399	79,099	Kod ...	513	449	...	898	61
				1	1	2,860	1,200		439	95,217	Karajghi ...	1,524	1,336	...	2,517	198
				1	1	1,624	1,286		279	52,729	Kalghatghi ...	840	782	...	1,417	168
				1	1	955	695		369	73,503	Ron ...	473	473	...	865	73
				2	2	1,965	1,601		701	120,655	Gadaka ...	1,002	963	5	1,654	291
		1	1	14	13	21,919	16,544		4,565	988,037		11,004	10,212	44	18,068	2,603

* Not given in the Census Report.

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.	Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	269	623	1,936	2,531	42	10	2,583	24	4	5	...	9	...	98·3	44·4	2,568
...	476	1,691	4,302	5,949	180	4	6,133	140	62	30	...	92	...	97·0	67·3	3,042
...	436	662	1,716	2,329	113	...	2,442	64	101	95	...	196	...	95·3	51·5	2,574
...	323	733	1,865	2,531	129	9	2,669	71	39	23	...	62	...	95·1	62·9	2,660
..	231	825	2,106	2,858	131	30	3,019	88	9	12	...	21	...	95·6	42·8	2,952
...	284	1,084	3,268	4,272	176	1	4,449	97	200	161	...	361	...	96·0	55·4	2,356
...	115	1,284	2,732	3,939	116	34	4,089	73	15	14	4	33	..	97·1	51·7	2,024
...	283	857	1,564	2,386	51	7	2,444	23	36	...	...	36	...	97·9	100	2,457
...	2,417	7,759	19,489	26,795	938	95	27,828	580	466	340	4	810	...	96·6	57·8	2,550
...	272	987	818	1,670	74	97	1,841	36	...	...	...	...	...	95·7	...	1,805
...	122	677	1,263	1,852	33	60	1,945	...	...	...	...	...	...	98·2	...	972
...	86	822	732	1,555	...	...	1,555	1	...	...	...	...	...	100	...	1,554
...	182	517	1,098	1,437	73	120	1,630	15	...	...	...	...	...	95·1	...	1,615
...	174	685	544	1,109	54	86	1,249	20	...	...	...	...	...	95·3	...	1,229
...	836	3,688	4,460	7,623	234	363	8,220	72	...	..	...	...	...	97·0	...	1,358
14	15,005	55,299	69,847	120282	3,447	2,595	126324	1,178	544	371	14	929	...	97·2	59·4	2,001
8	122	861	2,259	3,017	84	30	3,131	11	33	12	1	46	...	97·2	73·3	1,583
...	14	459	1,961	2,361	22	39	2,422	2	2	2	...	4	...	99·0	50·0	2,424
...	25	485	1,299	1,724	55	41	1,820	36	3	3	...	6	...	96·9	50·0	1,790
...	78	825	1,347	2,113	42	28	2,183	11	...	...	...	...	...	98·0	...	1,086
...	180	1,011	2,435	3,211	110	134	3,455	9	...	...	...	...	...	96·6	...	1,723
...	43	669	1,479	2,044	38	88	2,170	22	2	1	...	3	...	98·1	66·6	2,151
...	14	534	475	925	12	72	1,009	...	3	1	...	4	...	98·7	75·0	1,013
8	476	4,844	11,255	15,395	363	432	16,190	91	43	19	1	63	...	97·6	69·3	1,616
...	92	978	2,376	3,192	109	58	3,359	5	4	10	...	14	...	96·6	28·5	1,684
...	9	737	987	1,631	44	52	1,727	3	...	...	...	...	...	97·3	...	1,724
...	16	208	1,224	1,313	90	88	1,491	59	171	333	99	603	1	93·5	33·9	2,034
...	116	386	2,007	2,323	31	53	2,407	14	7	7	1	15	...	98·6	50·0	2,408
...	57	1,683	1,547	3,132	91	41	3,264	34	51	9	1	61	...	97·1	85·0	1,645
...	3	106	622	685	26	23	734	6	...	...	...	...	...	96·3	...	728
...	3	134	828	862	78	71	1,011	49	...	...	...	...	...	91·7	...	962
...	145	334	2,526	2,591	106	163	2,860	...	...	...	...	...	...	96·0	...	2,860
...	37	658	964	1,563	26	36	1,625	3	1	1	...	2	...	98·3	50·0	1,624
...	8	262	684	815	126	61	1,002	56	1	8	1	10	1	86·6	11·1	955
....	15	889	1,076	1,810	74	104	1,988	23	...	...	...	...	...	96·0	...	982
...	501	6,375	14,841	19,917	801	750	21,468	252	235	368	102	705	2	96·1	38·9	1,565

1	2	3		4		5		6		7	8	Primary					
												A.		B.			
												Sex.		Caste.			
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindú.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.										
Southern Circle—*contd.*	J. Raby, Surgeon.	1	1	1	1	1,640	898	Kánará Collectorate.	281	45,131	Karwar ...	909	710	76	1,435	92
				2	2	2,687	3,520		666	90,042	Kumpta ...	1,416	1,188	42	2,376	12
				2	2	2,456	2,178		400	82,867	Honáwar ...	1,201	1,130	78	1,981	162
				1	1	1,589	929		550	58,099	Sirsí ...	824	700	1	1,421	93
				2	1	1,210	912		640	34,298	Hápur ...	646	559	23	1,087	74
				1	1	2,131	2,045		594	34,183	Siddapur ...	1,176	951	...	1,973	33
				2	2	4,360	3,427		1,110	53,786	Halial ...	2,403	1,940	38	4,070	32
		1	1	11	10	16,073	13,909		4,235	398,406		8,575	7,178	258	14,343	498
				2	2	3,904	2,891	Kaládgi Collectorate.	684	110,185	Bágalkot ...	1,943	1,894	2	3,303	409
				1	1	2,039	1,764		518	105,866	Hunugundá ...	1,017	1,009	...	1,764	147
				1	1	1,551	759		757	93,738	Bágewadí ...	776	756	...	1,247	190
				2	1	2,618	2,035		690	130,816	Badámí ...	1,354	1,264	...	2,430	164
		1	1	1	1	2,057	1,722		552	83,848	Mudebihál ...	1,059	996	...	1,672	255
				1	1	2,057	1,155		837	105,475	Indi ...	1,037	1,019	...	1,687	228
				1	1	1,856	1,394		792	99,798	Sindghi ...	948	905	...	1,475	274
				2	2	2,996	2,388		865	86,311	Bijápur ...	1,419	1,483	...	2,486	320
		1	1	11	10	19,078	14,108		5,695	816,037		9,553	9,326	2	16,064	1,987
		...	...	1	1	7,543	6,257	Sáwantwádi.	900	190,814	Sáwantwádi ...	3,588	3,415	215	6,682	102
				1	1	1,113	837	Southern Maráthá States.	204	103,126	Sánglí ...	576	536	...	966	114
				1	1	747	190		311	44,630	Shirhatti ...	373	374	...	670	56
				1	1	1,229	154		218	26,268	Mangalvedhá ...	634	594	...	1,159	59
				1	...	380	...		163	49,639	Shápur&Dodwad	191	189	2	352	23
				1	1	687	703		277	63,280	Miraj, 1st ...	365	321	...	577	89
				1	1	502	436		63	18,921	Lakshmeshwar...	246	256	...	418	69
				1	1	505	984		208	35,601	Miraj, 2nd ...	281	224	...	463	42
		...	...	1	1	1,106	1,627		182	39,420	Kurandwád, 1st	577	527	5	915	104
				1	1	717	573		114	30,251	Do 2nd...	342	374	...	496	115
				1	1	1,522	1,208		362	58,921	Mudhol ...	823	690	...	1,359	94
				1	1	420	859		140	38,031	Ramdurg ...	214	206	...	392	20
				1	1	1,517	636		403	79,830	Jamkhandi ...	776	706	...	1,331	130
				1	1	565	1,055		89	22,516	Kundegal ...	291	274	...	470	35
				1	1	570	389		70	17,288	Sávanur ...	266	284	...	392	116
		...	...	14	13	11,580	9,651		2,804	627,722		5,955	5,555	7	9,960	1,066

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.										Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
Parsi.	Other Castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	16	182	1,437	1,440	58	140	1,638	19	12	9	1	22	1	96·1	57·1	1,640
...	174	285	2,319	2,509	75	22	2,606	2	55	27	1	83	...	97·0	67·0	1,343
...	110	184	2,147	2,117	127	96	2,340	9	96	16	14	126	1	94·3	85·7	1,223
...	9	97	1,427	1,508	10	6	1,524	...	62	3	...	65	...	99·3	95·2	1,589
...	21	152	1,053	1,127	29	52	1,208	3	2	2	1	5	...	97·4	50·0	605
...	121	201	1,926	2,060	28	99	2,127	...	4	...	...	4	...	98·6	100	2,131
...	203	240	4,103	4,242	68	54	4,364	21	17	...	...	17	...	98·4	100	2,180
...	654	1,341	14,412	14,943	395	469	15,807	54	248	57	17	322	2	97·4	81·3	1,461
...	123	1,940	1,897	3,548	84	209	3,841	4	35	15	17	67	...	97·6	70·0	1,952
...	115	768	1,258	1,934	25	92	2,051	25	13	...	...	13	...	98·7	100	2,039
...	95	648	884	1,402	55	84	1,541	9	9	5	5	19	...	96·2	64·2	1,551
...	24	847	1,771	2,580	16	32	2,628	10	...	...	...	...	...	99·3	...	1,309
...	128	1,001	1,054	1,885	85	101	2,071	16	...	2	...	2	...	95·6	...	2,057
...	141	857	1,199	1,999	11	148	2,068	12	...	...	1	1	...	99·4	...	2,057
...	104	852	1,001	1,624	123	110	1,857	4	1	2	...	3	...	92·9	33·3	1,856
...	96	1,581	1,321	2,690	24	200	2,914	12	21	37	36	94	...	99·1	36·2	1,498
...	826	8,494	10,385	17,572	423	976	18,971	92	79	61	59	199	..	97·6	56·4	1,734
...	4	1,929	5,074	6,774	281	43	7,098	95	356	174	10	540	...	96·0	67·1	7,543
...	32	642	470	980	55	78	1,113	1	1	...	...	1	...	94·6	100	1,113
...	21	142	605	676	40	32	748	1	...	...	...	...	...	94·4	...	747
...	10	639	589	1,117	95	101	1,313	85	1	...	...	1	...	92·1	100	1,229
...	3	107	273	368	4	11	383	3	...	...	...	...	...	98·9	...	380
...	20	289	397	580	39	72	691	5	1	...	...	1	...	93·6	100	687
...	15	135	367	426	47	33	506	4	...	...	...	...	...	90·0	...	502
...	...	153	352	502	3	...	505	...	...	...	...	...	...	99·4	...	505
...	80	224	880	1,056	79	13	1,148	44	1	1	..	2	...	92·9	50·0	1,106
...	105	464	252	652	30	37	719	3	1	...	...	1	...	95·6	100	717
...	60	544	969	1,478	30	5	1,513	...	9	...	...	9	...	98·0	100	1,522
...	8	160	260	417	3	...	420	...	...	...	...	...	...	99·2	...	420
...	21	761	721	1,393	41	57	1,491	9	24	6	5	35	...	97·1	80·0	1,517
...	60	184	381	531	58	24	613	48	...	...	...	...	...	90·1	...	565
...	42	181	369	507	42	14	563	13	14	4	2	20	...	92·3	77·7	570
...	477	4,625	6,885	10,683	566	477	11,726	216	52	11	7	70	...	94·9	82·5	827

1	2	3		4		5		6		7	8		Primary				
													A.		B.		
													Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.		Males.	Females	Christian.	Hindú.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.										
Southern Circle—*concluded.*	J. Raby, Surgeon.			1	1	1,867	1,715	Kolhápur States.	235	32,414	Vishálgarh	...	971	896	...	1,575	46
				1	1	1,322	1,924		201	59,530	Ichalkaranji	...	667	655	...	1,162	82
				1	1	1,364	1,582		129	47,801	Kágal	...	703	648	...	1,216	26
				1	1	1,809	1,455		438	128,204	Gadhinglaj	...	942	867	5	1,680	60
				1	1	1,791	1,556		83	43,439	Báurá	...	917	874	...	1,480	73
		1	1	1	1	2,149	1,811		367	106,714	Panálá	...	1,055	1,094	...	1,835	47
				1	1	1,076	1,946		456	91,148	Buthargarh	...	578	498	4	1,013	9
				1	1	1,837	1,483		356	79,722	Shirol	...	924	913	...	1,597	132
				1	1	786	877		192	84,464	Torgal	...	391	395	...	713	36
				1	1	1,067	913				Ajrá	...	565	502	16	974	40
				1	1	2,019	2,305		321	129,455	Kolhápur Pethá.		1,033	986	...	1,711	35
		1	1	11	11	17,087	17,567		2,778	802,691			8,746	8,328	25	14,956	586
Total of Southern Circle.		5	5	72	68	109,442	93,046		25,569	4,762,457			55,814	51,720	709	94,304	8,068
Western Circle.	T. Cody, Surgeon.			2	2	1,354	1,058	Thána Collectorate.	164	93,324	Salsette	...	716	617	279	964	48
				1	1	1,245	1,191		216	61,089	Bassein	...	618	626	353	868	7
				1	1	1,584	1,004		244	74,267	Bhiwandi	...	816	764	...	1,354	68
				1	1	1,794	1,284		259	72,556	Kalian	...	891	896	...	1,563	63
				1	1	1,720	1,077		644	110,423	Dahánu	...	861	827	7	1,452	3
		1	1	1	1	1,393	1,036		343	77,150	Karjat	...	706	677	...	1,278	20
				1	1	1,030	1,109		413	71,974	Mahim	...	490	540	4	1,004	2
				1	1	1,326	1,071		345	57,203	Murbád	...	660	666	...	1,191	19
				2	2	2,633	1,435		285	96,717	Panwel	...	1,344	1,288	27	2,548	39
				1	1	4,063	2,287		849	100.304	Shahpur	...	2,045	2,017	...	3,806	37
				1	1	470	975		290	32,420	Wádá	...	232	233	...	442	...
		1	1	13	13	18,612	13,527		4,052	847,424			9,379	9,151	670	16,470	306
				1	1	1,580	1,444	Kolába Collectorate.	192	66,947	Alibag	...	783	796	15	1,479	51
				1	1	1,661	1,862		346	72,773	Mángáon	...	871	774	...	1,487	5
		1	1	1	1	2,393	2,188		455	105,365	Máhád	...	1,134	1,147	...	2,174	46
				1	1	1067 / 641	1,990		192	43.962	Pen	...	492	555	...	1,020	18
									105	19.401	Nágotna Pethá	...	314	325	1	618	20
				1	1	1,116	391		192	41,997	Rohá	...	582	533	...	954	38
		1	1	5	5	8,458	7,875		1,482	350,405			4,176	4,130	16	7,732	178
				1	1	1,510	1,731	Násik Collectorate.	444	67,835	Nasik	...	785	725	...	1,374	31
				1	1	695	712		2	22,436	Nasik Town	...	309	358	29	556	80
				1	1	1,643	1,018		672	57,735	Igatpuri	...	873	768	3	1,508	3
				1	1	1,392	1,450		371	86,017	Niphád	...	649	743	...	1,232	60
				1	1	1,642	1,617		323	50,130	Chándur	...	840	802	...	1,352	46
		1	1	1	1	1,966	1,399		507	64,872	Sinnar	...	929	1,037	...	1,849	54
				1	1	2,020	1,396		775	66,956	Máligám	...	984	945	...	1,744	45
				1	1	1,797 / 324	1,927		720 / 1,900	47,250 / 65,953	Baglan / Kulwan	...	888 / 177	904 / 141	...	1,714 / 288	43 / 13
				1	1	1,378	1,354		424	30,230	Nandgáon	...	439	464	...	698	43
				1	1	1,269	1,193		482	59,313	Sáwargáon	...	624	645	...	1,032	55
				1	1	1,799	1,447		560	68,626	Dindori	...	880	919	...	1,639	17
		1	1	11	11	17,435	15,244		7,180	687,353			8,377	8,451	32	14,986	490

9									10					11		12
vaccine operations.									Re-vaccinations.							
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.										Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
Parsi.	Other Castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
...	246	676	1,191	1,785	43	39	1,867	...	...	...	...	...	...	97·6	...	1,867
...	78	960	362	1,152	12	158	1,322	...	...	...	...	...	...	98·9	...	1,322
...	109	505	846	1,253	24	74	1,351	...	13	...	...	13	...	98·1	100	1,364
...	64	300	1,509	1,661	87	61	1,809	...	...	...	...	...	...	95·0	...	1,809
...	238	324	1,467	1,774	4	16	1,794	3	...	...	...	...	...	99·7	...	1,791
...	267	581	1,568	2,117	21	11	2,149	...	...	...	...	...	...	99·0	...	2,149
...	50	190	886	993	44	39	1,076	...	...	...	...	...	...	95·7	...	1,076
...	108	868	969	1,678	40	119	1,837	...	...	...	...	...	...	97·6	...	1,837
...	37	395	391	765	24	15	804	18	...	...	...	...	...	96·9	...	786
...	37	380	687	999	32	59	1,090	23	...	...	...	...	...	96·8	...	1,067
...	273	638	1,381	1,951	50	24	2,025	6	...	...	...	...	...	97·5	...	2,019
...	1,507	5,817	11,257	16,128	381	615	17,124	50	13	...	...	13	...	97·6	100	1,553
8	4,445	33,425	74,109	101412	3,210	3,762	108384	850	1,026	690	196	1,912	4	96·9	59·7	1,520
5	37	731	602	1,183	88	69	1,340	7	14	3	4	21	...	93·0	82·3	677
...	16	895	349	1,206	46	...	1,252	8	1	...	...	1	...	96·3	100	1,245
...	158	686	894	1,470	158	21	1,649	69	1	3	...	4	...	90·2	25·0	1,584
...	161	844	943	1,647	94	54	1,795	8	3	4	...	7	...	94·6	42·9	1,794
25	201	484	1,204	1,660	45	11	1,716	28	20	10	2	32	...	97·3	66.6	1,720
...	85	732	651	1,252	101	30	1,383	...	...	10	...	10	...	92·5	...	1,393
...	20	541	489	982	28	20	1,030	...	...	...	...	...	...	97·2	...	1,030
...	116	876	450	1,244	76	23	1,343	17	...	...	...	...	...	94·2	...	1,326
...	18	2,111	521	2,481	137	21	2,639	7	...	1	...	1	...	94·7	...	1,316
...	219	1,310	2,752	3,808	198	66	4,072	10	...	1	...	1	...	95·0	...	4,063
...	23	95	370	387	57	21	465	...	...	5	...	5	...	87·1	...	...
30	1,054	9,305	9,225	17,320	1,028	336	18,684	154	39	37	6	82	...	94·3	51·3	1,431
...	34	1,268	311	1,519	24	42	1,585	6	...	1	...	1	...	98·4	...	1,580
...	153	1,018	627	1,498	107	68	1,673	28	7	8	1	16	...	93·3	46·6	1,661
...	61	765	1,516	2,065	183	49	2,297	16	76	27	9	112	...	91·8	73·7	2,393
...	9	826	221	1,040	15	4	1,059	12	9	8	3	20	...	98·5	52·9	1,708
...	...	534	105	633	4	4	641	2	2	..	..	2	...	99·3	100	
...	123	656	459	1,055	70	9	1,134	19	...	1	...	1	...	93·7	...	1,116
...	380	5,067	3,239	7,810	403	176	8,389	83	94	45	13	152	...	95·0	67·6	1,691
...	105	553	957	1,295	95	140	1,530	20	...	...	...	...	...	93·1	...	1,510
...	2	325	342	592	58	21	671	4	16	11	1	28	...	91·0	59·2	695
...	127	270	1,371	1,364	278	57	1,699	58	...	2	...	2	...	83·0	...	1,643
...	100	863	529	1,254	89	54	1,397	5	...	...	...	...	...	93·3	...	1,392
...	244	1,116	526	1,621	5	19	1,645	3	...	...	...	...	...	99·6	...	1,642
...	63	874	1,092	1,758	160	66	1,984	18	...	...	...	...	...	91·6	...	1,966
...	140	1,126	803	1,837	67	63	1,967	38	24	66	1	91	...	96·4	26·6	2,020
...	35	830	962	1,633	73	93	1,799	7	4	1	...	5	...	95·7	80·0	1,797
...	17	118	200	300	5	13	318	...	5	1	...	6	...	98·3	83·3	324
...	162	312	591	781	176	53	1,010	107	250	182	43	475	...	81·6	57·8	1,378
...	182	685	584	1,140	95	34	1,269	...	...	...	...	...	...	92·3	...	1,269
...	143	849	950	1,740	10	59	1,809	10	...	...	...	...	...	99·4	..	1,799
...	1,320	7,921	8,907	15,315	1,111	672	17,098	270	299	263	45	607	...	93·2	53·2	1,585

1	2	3		4		5		6	7	8						
											Primary					
											A.		B.			
		Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.					Sex.		Caste.			
Circle.	Name and rank of superintendent.	1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.	Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindú.	Musalman.
Western Circle—*concluded.*	T. Cody, Surgeon.	2	2	2	2	2,604	2,582	Khándesh Collectorate.	759	66,929	Dhuliá ...	1,340	1,263	5	2,098	220
				1	1	1,907	1,700		867	124,519	Sáwádá ...	873	1,034	...	1,595	68
				1	1	2,044	1,260		319	60,109	Nasirábád ...	974	1,070	...	1,844	105
				1	1	2,545	2,285		467	76,689	Irandol ..	1,267	1,273	...	2,280	133
				1	1	1,633	1,997		527	70,351	Jámner ...	815	817	...	1,469	87
				1	1	959	1,313		780	34,642	Sherpur ...	527	424	...	919	32
				1	1	2,461	2,010		468	46,228	Shahade ...	1,244	1,212	...	2,050	53
				1	1	895	669		1,135	35,278	Talode ...	437	449	...	868	16
				1	1	1,233	902		647	45,285	Nandurbár ...	624	609	...	1,140	21
				1	1	1,899	1,573		511	44,568	Chálisgáon ...	981	918	...	1,707	81
				1	1	2,186	2,088		1,039	60,125	Pimpalner ...	1,087	1,092	...	2,145	34
				1	1	1,476	1,257		542	84,880	Pachorá ...	736	740	...	1,330	41
				1	1	2,215	1,805		495	51,581	Chopde ...	1,112	1,099	...	1,860	168
				1	1	1,666	1,292		529	79,863	Amalner ...	817	849	...	1,385	89
				1	1	2,216	2,375		507	63,350	Virdal ...	1,107	1,109	...	1,914	114
				1	1	815	1,186		570	84,245	Bhosáwal ...	395	420	13	703	41
		2	2	17	17	28,754	26,294		10,162	1,028,642		14,336	14,378	18	25,307	1,303
				1	1	1,903	2,044	Native States.	534	37,406	Jawár ...	995	908	...	1,749	2
				2	1	4,310	2,982		151	71,996	Janjirá ...	2,158	2,129	...	2,996	721
				1	1	1,361	990		960	47,033	Penth ...	673	688	...	1,361	...
				...	...	...	...		3,840	39,111	Khandesh Agency	...	...	...	...	...
		...	...	4	3	7,574	6,016		5,485	195,546		3,826	3,695	...	6,106	723
Total of Western Circle.		5	5	50	49	80,833	68,956		28,361	3,109,370		40,094	39,835	736	70,601	3,0
Eastern Gujaráth Circle.	Mancharji Beramji Cola, M.D.	1	1	1	1	2,387	2,598	Khedá Collectorate.	166	85,754	Mahmudábád ...	1,215	984	...	1,832	152
				1	1	2,070	2,481		217	78,673	Mátar ...	1,133	902	...	1,648	158
				2	2	3,244	3,795		223	151,483	Nariad ...	1,735	1,458	...	2,585	358
				1	1	2,671	1,786		279	86,742	Kapatbanj ...	1,380	1,260	...	2,274	183
				1	1	1,994	1,708		246	85,601	Thasrá ...	1,108	886	1	1,628	198
				2	2	3,358	1,549		237	149,952	Anand ...	1,837	1,501	...	2,800	264
				1	1	3,880	4,362		193	144,528	Borsad ...	2,036	1,819	...	3,300	121
		1	1	9	9	19,604	18,279		1,561	782,733		10,444	8,810	1	16,067	1,434
				2	2	2,643	3,197	Broach Collectorate.	250	110,291	Broach ...	1,350	1,292	5	1,462	924
				1	1	2,784	2,399		348	93,249	Jambusar ...	1,473	1,294	...	1,941	530
		1	1	1	1	811	1,058		169	40,260	Amod ...	421	389	...	567	171
						640	953		304	38,779	Wagra ...	342	298	...	436	135
				1	1	1,055	1,525		134	41,087	Ankleshwar ...	507	531	...	762	186
						616			153	26,656	Hansot Petha ...	314	302	...	502	41
		1	1	5	5	8,549	9,132		1,358	350,322		4,407	4,106	5	5,670	1,987

9									10					11	12
vaccine operations.									Re-vaccinations.						
		C.		D.			E.	F.	A.	B.	C.	D.	E.		
		Age.		Result.											
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
1	279	1,431	1,172	2,564	25	14	2,603	...	1	...	...	1	....	99·0	100	1,302
...	244	1,047	860	1,827	55	43	1,925	18	...	...	...	...	...	97·0	...	1,907
...	95	858	1,186	1,974	...	70	2,044	...	...	...	...	...	...	100	...	2,044
...	127	925	1,615	2,457	40	44	2,541	1	5	...	...	5	...	98·3	100	2,545
...	76	904	728	1,477	105	144	1,726	94	1	...	...	1	...	93·3	100	1,633
...	...	636	315	935	82	4	1,021	70	6	2	...	8	...	91·9	75·0	959
...	353	1,075	1,381	2,368	115	11	2,494	38	2	3	...	5	...	95·3	40·0	2,461
...	2	335	551	855	30	15	900	14	9	...	...	9	...	96·6	100	895
...	72	444	789	1,208	28	3	1,239	6	...	..	...	...	...	97·7	...	1,233
...	111	936	963	1,750	68	98	1,916	17	...	...	...	...	...	96·2	...	1,899
..	...	496	1,683	2,027	95	76	2,198	19	6	1	...	7	...	95·5	85·7	2,186
...	105	403	1,073	1,359	50	86	1,495	19	...	...	...	...	...	96·4	...	1,476
...	183	1,017	1,194	2,054	40	120	2,214	3	3	1	...	4	...	98·0	75·0	2,215
...	192	380	1,286	1,604	15	63	1,682	16	...	...	...	...	...	99·0	...	1,666
...	188	776	1,440	2,166	...	50	2,216	...	...	...	...	...	...	100	...	2,216
...	58	446	369	733	52	34	819	4	...	...	...	...	...	93·3	...	815
1	2,085	12,109	16,605	27,358	800	875	29,033	319	33	7	...	40	...	97 1	82 5	1,691
...	152	360	1,543	1,772	55	76	1,903	...	...	...	...	...	...	96·9	...	1,903
...	570	1,521	2,766	3,952	258	99	4,309	22	18	5	...	23	...	93·8	78·2	2,155
..	...	54	1,307	1,219	21	121	1.361	...	...	...	...	...	...	98·3	...	1,361
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	722	1,935	5,616	6,943	334	296	7,573	22	18	5	...	23	...	95·4	78·2	1,893
31	5,561	36,337	43,592	74,746	3,676	2,355	80,777	848	483	357	64	904	...	95·3	57·5	1,616
...	215	1,737	462	2,142	52	11	2,205	6	97	81	10	188	...	97·6	54·4	2,387
...	229	1,492	543	1,883	144	15	2,042	7	21	14	...	35	...	92·8	60·0	2,070
3	247	2,186	1,007	3,092	81	27	3,200	7	38	10	3	51	...	97·4	79·1	1,622
...	183	1,880	760	2,598	48	2	2,648	8	-20	11	...	31	...	98·1	64·5	2,671
...	167	1,134	860	1,967	21	6	1,994	...	...	...	...	...	...	98·9	...	1,994
1	273	1,899	1,439	3,215	114	34	3,363	25	9	8	3	20	...	96 5	52·9	1,679
...	434	3,030	825	3,762	108	17	3,887	32	11	13	1	25	...	97·2	45·8	3,880
4	1,748	13,358	5,896	18,659	568	112	19,339	85	190	137	17	350	...	97·0	58·8	2,178
45	206	1,570	1,072	2,602	13	28	2,643	1	...	1	...	1	...	99·5	...	1,321
...	296	2,003	764	2,709	54	24	2,787	20	12	3	2	17	...	98·0	80·0	2,784
1	71	418	392	793	20	10	823	13	1	...	...	1	...	97·5	100	1,451
...	96	313	327	631	14	3	648	8	...	...	...	...	...	97·8	...	
...	90	774	264	1,013	17	15	1,045	7	9	8	...	17	...	98·3	52·9	1,671
...	73	443	173	594	12	14	620	4	...	...	...	...	...	98·0	...	
46	805	5,521	2,992	8,342	130	94	8,566	53	2:	12	2	36	....	98·4	64·7	1,709

1	2	3		4		5		6		7	8		Primary				
													A.		B.		
													Sex.		Caste.		
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of táluká or town.		Males.	Females.	Christian.	Hindú.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.										
Eastern Gujarath Circle—*concluded.*	Mancharji Berámji Cola, M.D.			1	1	1,985	2,791	Surat Collectorate.	3	107,149	Surat City	...	919	736	10	1,209	235
				1	1	1,092	794		67	48,435	Chorásí	...	581	500	...	905	75
				1	1	1,654	1,901		355	66,256	Ulpád	...	854	773	2	1,360	63
				1	1	1,722	1,831		184	70,112	Jalálpur	...	911	808	...	1,483	114
		1	1	1	1	2,505	2,690		261	77,500	Bardoli	...	1,286	1,197	...	2,176	128
				1	1	1,424	1,768		172	48,367	Mándvi	...	722	688	..	1,238	128
				1	1	1,790	2,170		167	59,312	Chikli	...	767	784	...	1,365	118
				1	1	1,937	1,796		217	78,207	Balsád	...	960	938	...	1,769	86
				1	1	1,637	1,617		162	51,749	Párdi	...	839	797	...	1,523	16
		1	1	9	9	15,746	17,358		1,588	607,087			7,839	7,221	12	13,028	913
				1	1	1,680	1,409	Panch Mahals.	678	74,014	Godhrá	...	861	806	...	1,628	16
				1	1	3,112	2,343		325	63 513	Dohad	...	1,371	1,424	...	2,597	148
		1	1	1	1	1,331	1,448		153	40,505	Kalol	...	689	598	...	1,153	44
				1	1	1,932	1,797		200	36,785	Jhálod	...	976	903	...	1,840	22
				1	1	1,643	1,001		375	25,926	Halol	...	802	811	...	1,513	16
		1	1	5	5	9,698	7,998		1,731	240,743			4,699	4,542	...	8,731	246
				2	2	2,656	2,191	Rewá Kánthá States	390	74,813	Lunwádá	...	1,397	1,225	...	2,435	39
				2	2	3,251	3,100		1,230	120,121	Rájpiplá	...	1,645	1,606	...	2,965	101
				2	2	4,067	3,822		813	52,421	Báriá ...	...	2,067	1,977	...	3,723	12
				1	1	1,150	1,091		150	41,984	Bálásinur	..	587	558	...	988	73
				1	1	969	549		820	62,913	Chotá Udaipur	...	410	549	...	887	2
				1	1	599	1,734		355	49,675	Sunth	...	319	260	...	573	6
						407	...		196	15,221	Kadáná	...	202	204	...	404	2
				1	1	774	888		639	88,584	Sankhedá Mewás.		374	398	...	760	12
				...	...	199	...		143	6,837	Jambugodá	...	94	104	...	198	
				10	10	14,072	13,375		4,736	512,569			7,095	6,881	...	12,933	247
						1,089	1,059	Mahi Kánthá.	...	42,300	Wátrak Kánthá	...	558	529	...	999	39
				3	3	1,307	191		...	30,114	Rhevar	...	640	661	...	1,137	10
						5,184	5,057		...	271,698	Náni Márwád	...	2,832	2,337	...	4,750	128
						952	863		...	38,478	Bávesi	...	527	424	...	819	43
				1	1	...	2		4,000	22,876	Katosan	...	...	...	...	...	...
				1	1	924	512		...	41,590	Sábar Kánthá	...	478	427	...	651	180
				5	5	9,456	7,684		4,000	447,056			5,035	4,378	...	8,356	400
				1	1	2,684	2,341	Cambay ...	350	83,494	Cambay	...	1,319	1,341	...	2,132	
				1	1	3,668	2,725	Dharmpur.	225	74,592	Dharmpur	...	1,870	1,798	...	3,373	
				1	1	2,127	2,860	Bánsdá ...	325	32,154	Bánsda	...	1,066	1,061	...	1,911	
				*	...	547	348	Sachin ...	65	17,103	Sachin	...	274	272	...	468	57
				3	3	9,026	8,274		965	207,343			4,529	4,472	...	7,884	396
Total of Eastern Gujarati Circle.		4	4	46	46	86,151	82,100		15,939	3,147,853			44,048	40,410	18	72,669	5,623

* The Chorasi vaccinator

9									10					11		12
Vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
67	134	1,136	519	1,544	93	26	1,663	8	156	130	44	330	...	94·3	54·5	1,985
24	77	714	367	982	89	17	1,088	7	6	2	3	11	...	91·6	75·0	1,092
4	198	801	826	1,593	30	7	1,630	3	21	4	2	27	...	98·1	84·0	1,654
..	122	1,009	710	1,587	100	37	1,724	5	1	2	...	3	...	94·0	33·3	1,722
10	169	923	1,560	2,425	49	11	2,485	2	14	8	...	22	...	98·0	69·6	2,505
2	42	692	718	1,354	60	14	1,428	18	13	1	...	14	...	95·7	92·8	1,424
...	68	1,033	518	1,536	16	2	1,554	3	161	73	5	239	...	98·9	68·8	1,790
4	89	607	1,291	1,840	33	26	1,899	1	33	5	1	39	...	98·2	86·8	1,937
6	91	932	704	1,626	8	2	1,636	...	1	...	...	1	...	99·5	100	1,637
117	990	7,847	7,213	14,487	478	142	15,107	47	406	225	55	686	...	96·8	64·3	1,749
...	23	594	1,073	1,635	24	15	1,674	7	11	1	2	14	1	98·5	91·6	1,680
...	50	895	1,900	2,791	19	...	2,810	15	294	23	...	317	...	99·3	92·7	3,112
1	89	794	493	1,231	94	5	1,330	43	40	6	3	49	5	92·9	86·9	1,331
...	17	417	1,462	1,831	57	30	1,918	39	37	13	4	54	1	96·9	74·0	1,932
...	84	660	953	1,588	29	12	1,629	16	28	2	1	31	1	98·2	93·3	1,643
1	263	3,360	5,881	9,076	228	62	9,361	120	410	45	10	465	8	97·5	90·1	1,939
...	48	801	1,821	2,545	83	21	2,649	27	21	11	2	34	...	96·8	65·6	1,328
4	181	1,478	1,773	3,194	63	16	3,273	22	...	...	...	...	...	98·0	..	1,625
...	309	726	3,318	3,930	62	71	4,063	19	18	6	...	24	1	98·4	75·0	2,033
...	84	438	707	932	186	27	1,145	...	1	4	...	5	...	83·3	20·0	1,150
...	70	192	767	905	64	2	971	12	2	7	1	10	...	93·3	22·2	969
..	...	60	519	514	54	27	595	16	8	12	...	20	...	90·4	40·0	1,006
...	...	32	374	381	22	6	409	3	1	....	...	1	...	94·5	100	
...	...	311	461	726	43	16	785	13	...	2	...	2	...	94·4	...	774
...	...	70	128	195	2	1	198	...	1	...	...	1	...	98·9	100	...
4	792	4,108	9,868	13,322	579	187	14,088	112	52	42	3	97	1	95·8	55·3	1,387
...	49	608	479	1,019	70	3	1,092	5	...	2	...	2	...	93·5	...	2,526
...	154	452	849	1,291	9	3	1,303	2	5	1	...	6	...	99·3	83·3	
...	291	1,526	3,643	5,008	138	47	5,193	24	9	6	...	15	...	97·3	60·0	
...	89	506	445	905	37	11	953	2	...	...	1	1	...	96·0	...	952
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	74	442	463	879	16	11	906	1	11	8	...	19	...	98·2	57·8	924
...	657	3,534	5,879	9,102	270	75	9,447	34	25	17	1	43	...	97·1	59·5	1,891
5	224	1,677	983	2,624	50	5	2,679	19	15	9	...	24	...	98·1	62·5	2,684
3	263	511	3,157	3,639	26	3	3,668	...	...	...	...	...	...	99·2	....	3,668
...	205	206	1,921	2,059	39	29	2,127	...	...	...	...	...	...	98·1	...	2,127
3	18	266	280	514	15	18	547	1	...	1	...	1	...	97·1	...	547
11	710	2,660	6,341	8,836	130	55	9,021	20	15	10	...	25	...	98·5	60·0	2,826
183	5,965	40,388	44,070	81,824	2,378	727	84,929	471	1,126	488	88	1,702	9	97·1	69·7	1,872

vaccinated in the Sachin villages.

1	2	3		4		5		6		7	8					
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of táluká or town.	Primary A. Sex.		Primary B. Caste.		
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.					Males.	Females.	Christian.	Hindú.	Musalman.
Western Gujarath Circle.	E. R. Butler, M.D., Surgeon-Major; Offg. A. M. Blomfield, Surgeon-Major.			1	1	1,782	2,000	Ahmadábád Collectorate.	306	130,610	Daskroi ...	918	856	12	1,550	54
				2	2	5,467	4,580		2	116,873	Ahmadábád City	2,544	2,424	13	3,660	968
				...	...	...	...		3	1,883	Do. Camp	...	...	...	...	...
				2	2	3,034	2,546		650	113,375	Dholka ...	1,471	1,457	...	2,366	290
		1	1	2	2	4,117	4,690		1,203	124,860	Dhandúká ...	1,982	1,757	1	3,119	388
				2	2	3,321	3,045		655	128,044	Veramgaon ...	1,687	1,519	...	2,791	172
				1	1	2,298	1,892		356	73,229	Sanand ...	1,120	1,004	...	1,848	121
				1	1	1,873	1,686		266	71,072	Prantej	975	827	...	1,600	33
									180	35,862	Morásá Pethá					
				1	1	1,385	1,081		223	33,829	Gogo ...	695	657	...	1,151	80
		1	1	12	12	23,277	21,520		3,844	829,637		11,392	10,501	26	18,085	2,106
				1	1	2,044	1,561	Pálanpur States.	...	...	Disá ...	1,078	966	20	1,777	139
				1	1	2,847	2,785		2,384	215,972	Pálanpur ...	1,517	1,330	...	1,989	523
				1	1	1,268	945		...	...	Dhánerá ...	666	602	...	1,117	42
							2,105		507	37,771	Kákhrej					
				1	1	1,825	73		240	19,701	Deodar	1,007	818	...	1,633	58
							...		100	7,338	Tehrwádá					
							1,039		360	23,081	Wáo					
				1	1	1,881	650		644	44,510	Tharád	955	926	...	1,514	113
							78		440	13,574	Sántalpur					
							258		...	6,595	Morwádá					
							794		204	20,096	Wárye					
				1	1	1,362	51		...	3,983	Charchat	737	623	...	1,177	64
							...		...	636	Jajham					
							7		72	5,659	Bhábhar					
							...		161	10,104	Suigám					
				1	1	2,387	1,980		929	91,579	Rádhanpur ...	1,252	1,135	...	2,016	197
				7	7	13,614	12,326		6,041	502,586*		7,212	6,400	20	11,223	1,136
																Nor Divi Kathe
				1	1	2,425	2,906	Dhrángdrá.			Dhrángdra Hálwad Jinjiwádá Dasará	1,217	1,191	...	2,148	124
				1	1	2,263	2,461	Jinjirwádá.			Vitthalgarh Wanod Bajáná	1,231	1,032	...	1,964	160
				1	1	2,690	2,575	Native States.			Jasdan ...	1,323	1,349	...	2,288	161
				1	1	2,711	2,360				Limdi ...	1,432	1,261	...	2,350	204
				1	1	2,431	2,381				Saéla Sudamda Muli	1,169	1,073	...	1,961	95
				1	1	1,838	1,911				Wákáner Thán	944	882	...	1,362	315
				1	1	2,528	3,087				Wadwán ...	1,265	1,247	1	2,294	94
				7	7	16,886	17,681			...		8,581	8,035	1	14,367	1,153

* Inclusive of the population of disputed

9									10					11		12
vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Pársi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	158	1,166	608	1,650	79	56	1,785	11	7	1	...	8	..	95·4	87·5	1,782
24	303	3,960	1,008	4,807	124	97	5,028	60	419	69	14	502	3	97·4	85·8	2,733
...	...	...	...	...	...	..	...	...	..	...	...	...	...	...	...	..
...	272	2,335	593	2,648	66	230	2,944	16	45	2	59	106	...	97·5	95·7	1,517
...	231	2,038	1,701	3,447	167	184	3,798	59	225	101	53	379	1	95·3	69·0	2,058
4	239	2,192	1,014	2,990	133	126	3,249	43	74	21	21	116	1	95·7	77·8	1,660
...	155	1,561	563	1,931	131	106	2,168	44	120	35	19	174	...	93·6	77·4	2,298
...	169	1,359	443	1,619	207	16	1,842	40	55	14	2	71	...	88·6	79·7	1,873
...	121	821	531	1,286	42	35	1,363	11	19	7	7	33	...	96·8	73·0	1,385
28	1,648	15,432	6,461	20,378	949	850	22,177	284	964	250	175	1,389	5	95·5	79·3	1,939
...	108	1,190	854	2,000	9	35	2,044	...	...	...	...	...	...	99·5	...	2,044
...	335	1,580	1,267	2,807	13	27	2,847	...	...	...	...	...	...	99·5	...	2,847
...	109	630	638	1,201	50	17	1,268	...	...	...	...	...	...	96·0	...	1,268
...	134	1,442	383	1,660	63	126	1,849	24	...	...	...	...	...	96·3	...	1,825
...	254	1,154	727	1,839	..	42	1,881	...	...	...	...	...	...	100	...	1,881
...	119	786	574	1,196	67	130	1,393	33	...	2	...	2	...	94·6	...	1,362
...	174	981	1,406	1,803	319	265	2,387	....	...	...	..	...	...	84·9	...	2,387
...	1,233	7,765	5,849	12,506	521	642	13,669	57	...	2	...	2	...	96·0	...	1,944
thern sion of wad.																
...	136	920	1,488	2,210	118	91	2,419	11	10	4	3	17	...	94·9	71·4	2,425
...	139	1,161	1,102	2,231	23	14	2,268	5	...	...	...	...	...	98·9	...	2,263
...	223	1,472	1,200	2,619	34	23	2,676	4	17	1	...	18	...	98·7	94·4	2,690
...	139	1,149	1,544	2,585	116	34	2,735	42	5	12	1	18	...	95·7	29·4	2,711
...	186	895	1,347	2,183	21	38	2,242	....	151	15	23	189	...	99·0	90·9	2,431
...	149	1,016	810	1,379	178	275	1,832	6	10	2	...	12	...	88·5	83·3	1,838
...	123	1,531	981	2,369	111	37	2,517	5	8	5	3	16	...	95·5	61·5	2,528
...	1,095	8,144	8,472	15,576	601	512	16,689	73	201	39	30	270	...	96·2	83·7	2,412

villages, amounting to 1,987.

Western Gujarath Circle—*continued.*

E. R. Butler, M.D., Surgeon-Major; Offg. A. M. Blomfield, Surgeon-Major.

1	2	3		4		5		6		7	8	Primary				
												A.		B.		
												Sex.		Caste.		
Circle.	Name and rank of superintendents.	Number of native superintendents		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of táluká or town.	Males.	Females.	Christian.	Hindú.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74	1874-75.	1873-74.									
																Western of Kathe-
				1	1	2,362	2,078	Dharol ...	...	...	Dharol ... / Judiá ... / Jaliá ... / Diwáni ...	1,246	1,113	...	1,801	300
				1	1	1,868	1,635	Dráphá ...	...	...	Dráphá ... / Kondurná ...	970	898	...	1,508	281
				1	....	2,470	...	Gondal ...	...	...	Dhoráji ...	1,189	1,091	...	1,821	244
				...	1	...	2,419									
				1	...	1,385	...		...	...	Gondal ... / Wasáwar ...	673	712	...	1,240	107
				1	1	3,550	2,567	Morvi ..	...	...	Morvi ... / Tankárá ...	1,851	1,699	...	3,042	485
				1	1	2,184	2,221	Nawánagar.	...	...	Bhánwad ... / Jodhpur ...	1,122	1,062	...	1,761	323
				1	1	2,443	2,112		...	...	Khambáliá ...	1,314	1,129	...	2,007	281
				1	1	2,757	2,475		...	...	Nawánagar ...	1,443	1,314	..	1,873	732
				2	2	4,780	4,991	Rájkot ...	...	...	Rájkot ... / Gawáridhar ... / Pál ...	2,182	2,195	5	3,613	532
				1	1	2,007	2,894	Porbandar.	...	...	Porbandár ...	1,062	945	...	1,870	107
		1	1	11	10	25,806	23,392		...	...		13,052	12,158	5	20,536	3,392
																Southern of Kathe-
				1	1	2,436	1,914	Bábriawád.	...	...	Dídan ... / Jafrabad ...	1,243	1,166	...	1,995	240
				1	1	2,443	2,254	Bántwá ...	...	...	Bántwá ...	1,225	1,119	...	1,739	537
				1	1	2,090	2,137	Bagusra ...	...	...	Mánikwádá ... / Bilká ... / Bagusrá ...	1,039	1,042	...	1,864	158
				1	1	2,526	2,505	Jaitpur ...	...	...	Jaitpur ...	1,269	1,257	...	2,019	294
				1	1	2,438	1,904	Junágarh	...	...	Junágarh ...	1,261	1,174	...	1,854	506
				1	1	1,142	1,375		...	...	Mangarul ...	587	555	...	986	93
				1	1	2,433	2,499		...	...	Una ...	1,334	1,071	...	1,992	368
				1	1	1,327	1,985		...	...	Virráwal ... / Chorwad ...	627	660	...	927	232
				8	8	16,835	16,573		...	...		8,585	8,044	...	13,376	2,428

9									10					11		12
vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other Castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
Division wad.																
...	258	924	1,435	2,285	105	38	2,428	69	2	1	.	3	...	95·6	66·6	2,362
...	79	403	1,465	1,645	60	163	1,868	...	...	...	...	...	...	96·4	...	1,868
...	215	702	1,578	2,062	178	119	2,359	79	95	66	30	191	1	92·0	59·0	2,470
...	38	349	1,036	1,367	18	3	1,388	3	...	...	...	...	...	98·7	...	1,385
...	23	1,439	2,111	3,463	24	63	3,550	...	...	...	...	...	...	99·3	...	3,550
...	100	865	1,319	1,979	174	33	2,186	2	...	...	...	...	...	91·9	...	2,184
...	155	833	1,610	2,141	184	118	2,443	...	...	...	...	...	...	92·0	...	2,443
1	151	787	1,970	2,627	113	17	2,757	...	...	...	...	..	...	95·8	...	2,757
3	224	2,370	2,007	4,117	207	115	4,439	62	309	90	5	404	1	95·2	77·4	2,390
...	30	605	1,402	1,954	41	12	2,007	...	...	...	...	...	...	97·9	...	2,007
4	1,273	9,277	15,933	23,640	1,104	681	25,425	215	406	157	35	598	2	95·5	72·1	2,346
Division wad.																
...	174	1,316	1,093	2,226	154	35	2,415	6	15	11	1	27	...	93·5	57·6	2,436
..	68	928	1,416	2,313	23	8	2,344	...	95	2	2	99	...	99·0	97·9	2,443
...	59	663	1,418	2,036	39	6	2,081	...	7	...	2	9	...	98·1	100	2,090
...	213	1,390	1,136	2,330	121	75	2,526	...	...	...	...	..	..	95·0	..	2,526
...	75	1,213	1,222	2,407	10	19	2,436	1	3	...	...	3	...	99·5	100	2,438
...	63	457	685	1,102	14	26	1,142	...	...	...	...	...	...	98·7	...	1,142
2	43	1,695	710	2,403	...	2	2,405	...	27	...	1	28	...	100	100	2,433
...	128	541	746	1,050	46	224	1,320	33	29	3	9	41	1	95·8	90·6	1,327
2	823	8,203	8,426	15,867	407	395	16,669	40	176	16	15	207	1	97·4	91·6	2,104

1	2	3		4		5		6		7	8					
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political, agency or native state, in which vaccinations where performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary				
												A.		B.		
												Sex.		Caste		
		1874-75	1873-74	1874-75.	1873-74.	1874-75.	1873-74.					Males.	Females.	Christian.	Hindu.	Musalman.
Western Gujaráth Circle.—*concld.* E. R. Butler, M.D., Surgeon-Major; Offg. A. M. Blomfiled, Surgeon-Major.															Eastern Division	
				1	1	1,602	1,743	Bhawnagar.			Bhawnagar ...	813	782	2	1,256	310
				1	1	1,903	2,488				Botád ... / Láthi ...	967	926	...	1,697	134
				1	1	2,253	2,260				Kundalá ...	1,151	1,065	...	1,961	150
				1	1	2,569	2,493				Mowá ...	1,302	1,262	...	2,321	166
				1	1	1,683	1,037				Shehor ...	835	848	...	1,472	136
				1	1	2,352	2,351				Talájá ...	1,181	1,171	...	2,061	142
				1	1	2,323	2,358	Palitáná.			Pálitáná ...	1,191	1,130	...	2,102	148
				1	1	2,400	2,453	Walá.			Walá ...	1,207	1,193	...	2,209	149
		1	1	8	8	17,085	17,183					8,647	8,377	2	15,079	1,335
		2	2	34	33	76,612	74,829		20,339	23,12,629		38,865	36,614	8	63,358	8,308
Total of Western Gujaráth Circle.		3	3	53	52	113503	108675		30,224	36,44,852		57,469	53,515	54	92,666	11,550
Sindh Circle.	J. Williams, M.D., Surgeon.			1	1	530	223	Karáchi Collectorate.	946	5,631	Karáchi ...	268	252	...	41	479
				1	2	4,301	5,454		18	51,822	Karáchí Town ...	2259	1,202	168	856	2,190
									2	1,704	Do. Cantonment					
				1	1	3,976	1,883		747	66,350	Dádú ...	1,164	785	...	176	1,737
				1	1	1,547	1,059		925	54,292	Shewán ...	710	583	...	176	1,090
						202	618		582	18,551	Mánjhandá ...	78	76	...	...	154
				1	1	2,351	285		839 / 2,652	23,643 / 5,681	Kotrí ... / Kohistán ...	1,195	965	3	299	1,847
				1	1	1,269	1,245		1,322	37,877	Táttá ...	507	440	...	47	885
		2	2			1,326	873		1,284	22,646	Mírpur Sákrá ...	701	614	...	122	1,159
				1	1	1,212	1,248		642	31,411	Ghorábári ...	531	475	..	79	848
				1	1	1,353	2,267		2,962	21,046	Sháhbandar ...	602	452	..	104	805
				1	1	2,442	1,809		543	22,725	Játi ...	1,050	730	...	88	1,423
						...	1,069		294	28,471	Beká ...	...	...	...	...	...
				1	1	1,747	948		333	31,645	Mirpur Batorá...	869	738	...	50	1,452
		2	2	10	11	2,2256	18,981		14,091	423,495		9,934	7,312	171	2,038	14,069
				2	2	4,175	2,796	Shikárpur Collectorate.	472	73,383	Shikárpur ...	1,268	997	5	740	1,470
				2	1	2,896	2,847		1,549	66,451	Rohri ...	1,385	1,124	...	482	1,842
				1	1	1,215	2,244		167	20,488	Saidpur ...	348	353	...	81	560
						2,557	1,408		372	46,406	Ghotkí ...	1,369	568	...	614	1,230
				1	1	4,010	2,893		1,721	42,127	Mirpur Mátelo ...	1,335	1,035	...	192	1,993
				1	1	5,401	2,156		450	42,043	Ubáoro ...	1,854	1,233	...	460	2,227
				2	2	4,029	3,001		278	60,223	Sakkar ...	1,611	1,190	5	846	1,907
				1	1	3,497	3,068		415	48,226	Náoshero ...	1,911	506	...	355	1,995
						1,013	...		192	15,107	Sujáwal ...	522	439	...	101	832
		2	2	1	1	1,429	1,737		228	35,896	Rátáderá ...	551	423	...	145	813
				1	1	2,729	2,920		291	79,042	Lárkhána ...	919	835	...	174	1,450
				1	1	2,131	2,313		943	73,329	Kambar ...	780	656	...	108	1,279
				1	1	1,760	2,207		343	33,597	Nasirábád ...	882	551	...	90	1,327
						466	263		207	31,201	Labdaryá ...	99	87	...	8	170
				1	1	3,940	609		301	29,023	Tigr ...	1,561	1,155	...	341	2,318
						...	2,466		282	33,242	Mehar ...	...	...	...	...	...
				1	1	1,940	2,352		602	46,443	Kakar ...	771	305	...	108	963
		2	2	16	15	43,188	37,280		8,813	776,227		17,166	11,457	10	4,845	22,376

9									10					11		12
vaccine operations.									Re-vaccinations.					Percentage of successful cases excluding those unknown from the total.		
		C.		D.			E	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
of Kathewad.																
4	23	622	973	1,503	64	28	1,595		1	6	...	7	..	95·9	14·2	1,602
...	62	943	950	1,787	17	89	1,893	...	7	3	...	10	...	99·0	70·0	1,903
...	105	835	1,381	1,813	265	157	2,235	19	17	10	10	37	...	87·2	62·9	2,253
...	77	1,078	1,486	2,416	116	64	2,596	32	4	1	...	5	...	95·4	80·0	2,569
...	75	448	1,235	1,646	8	29	1,683	...	...	...	...	...	...	99·5	...	1,683
...	149	1,243	1,109	1,721	209	422	2,352	...	...	....	...	...	...	89·1	...	2,352
...	71	851	1,470	2,171	30	120	2,321	...	1	1	...	2	...	98·6	50·0	2,323
...	42	1,249	1,151	2,376	20	4	2,400	...	...	...	...	...	....	99·1	...	2,400
4	604	7,269	9,755	15,433	729	913	17,075	51	30	21	10	61	...	95·4	58·8	2,135
10	3,795	32,893	42,586	70,516	2,841	2,501	75,858	379	813	233	90	1,136	3	96·1	77·7	2,253
38	6,676	56,088	54,896	103400	4,311	3,993	111704	720	1,777	485	265	2,527	8	95·9	78·5	2,141
...	...	249	271	488	24	8	520	...	4	6	...	10	...	95·3	40·0	530
77	170	1,518	1,943	3,377	167	13	3,557	96	625	256	9	890	50	95·2	70·9	4,301
...	36	824	1,125	1,849	31	100	1,980	31	1,655	150	222	2,027	...	98·3	91·6	3,976
...	27	325	468	1,250	21	36	1,307	14	240	11	3	254	...	98·3	95·6	1,547
...	...	84	70	150	...	4	154	...	32	10	6	48	...	100	76·1	2,553
...	11	669	1,491	2,138	14	22	2,174	14	163	8	20	191	...	99·3	95·3	
...	15	465	482	942	10	5	957	10	295	22	5	322	...	98·9	93·0	1,269
...	34	479	836	1,252	23	44	1,319	4	4	5	2	11	...	98·1	44·4	2,538
...	79	407	599	970	3	34	1,007	1	189	7	11	207	1	99·6	96·4	
...	145	473	581	986	28	53	1,067	13	167	99	35	301	2	97·2	62·7	1,353
...	269	834	946	1,750	36	21	1,807	27	516	129	19	664	2	97·9	80·0	2,442
...	...	...	...	..	...	...	...	...	...	...	...	...	...	...	...	
...	105	600	1,007	1,534	14	59	1,607	...	107	10	23	140	...	99·0	91·4	1,747
77	891	7,427	9,819	16,686	371	399	17,456	210	3,997	713	355	5,065	55	97·8	84·8	2,225
...	50	1,402	863	2,203	52	44	2,299	34	1,593	184	146	1,923	13	97·6	89·6	2 087
...	185	1,115	1,394	2,329	49	179	2 557	48	320	9	58	387	...	97·9	97·2	1,448
...	60	379	322	696	6	5	707	6	463	4	47	514	...	99·1	99·1	3,772
...	93	429	1,508	1,851	15	86	1,952	15	527	26	67	620	...	99·1	95.2	
...	185	731	1,639	2,343	28	20	2,391	21	1,291	201	148	1,640	...	98·8	86·5	4,010
...	400	998	2.089	2,914	9	170	3,093	6	1,866	163	285	2,314	...	99·6	91·9	5,401
2	41	1,709	1,092	2,669	75	116	2,860	59	1,218	5	9	1,232	4	97·2	99·5	2,014
...	67	793	1,624	2,380	24	14	2,418	1	994	57	33	1,084	4	99·0	94·5	3,497
...	28	438	523	929	...	32	961	...	43	...	9	52	...	100	100	2,442
...	16	592	382	971	...	3	974	...	426	21	8	455	...	100	95·3	
...	130	675	1,079	1,661	31	68	1,760	6	557	185	233	975	...	98·1	75·0	2,729
...	49	919	517	1,369	...	67	1,436	...	521	13	161	695	...	100	97·5	2,131
...	16	349	1,084	1,397	11	32	1,440	7	311	14	2	327	...	99·2	95·6	2,226
...	8	81	105	186	...	...	186	...	220	47	13	280	...	100	82·3	
...	57	978	1,738	2,676	33	36	2,745	29	1,155	29	52	1,236	12	98·7	97·5	3,940
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	
...	5	480	596	997	22	74	1,093	17	790	23	57	870	6	97·8	97·1	1,940
2	1,390	12,068	16,555	27,571	355	946	28,872	249	12,295	981	1,328	14,604	39	98·7	92·6	2,699

1	2	3		4		5		6		7	8					
												Primary				
												A.			B	
												Sex.			Caste	
Circle.	Name and rank of superintendents.	Number of native superintendent.		Number of vaccinators.		Total number of persons vaccinated		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of tahuka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.									
Sindh Circle.—*concluded.*	J. Williams, M.D., Surgeon.			1	1	3,117	2,394	Haidrábád Collectorate.	414	96,281	Haidrábád ...	787	718	...	167	1,223
				1	1	2,003	2,054		...	...	Do. town	938	584	32	685	782
				1	1	1,607	1,669		989	59,971	Guni	781	526	...	144	1,046
				1	1	3,339	1,948		709	47,922	Bágá	1,168	941	...	226	1,526
				1	1	7,546	2,103		795	51,593	Baddin	1,837	1,672	...	407	2,906
				1	1	684	1,025		684	30,445	Derá Mohabat ...	193	183	...	51	256
		1	1	1	1	2,647	1,118		705	59,746	Aliyár	1,082	945	...	280	1,545
						...	1,564		561	22,449	Mirpurkhás ...	...	...	...	...	...
				1	1	3,974	1,872		724	55,707	Sháhdádpur ...	909	727	...	291	1,189
				1	1	3,363	2,831		531	78,237	Hálá	1,090	764	...	455	1,305
				1	1	2,607	2,123		1,390	53,566	Sakránd	839	683	...	179	1,306
				1	1	2,318	1,350		704	45,551	Morá	715	506	...	282	916
				1	1	3,123	1,584		531	72,711	Náoshero ...	1,242	996	...	437	1,726
				1	1	3,930	1,722		315	47,768	Khandiará ...	1,090	916	...	271	1,677
		1	1	13	13	40,258	25,357		9,052	721,947		12,671	10,161	32	3,875	17,403
				1	1	2,000	1,602	Upper Sindh Frontier.	474	29,946	Jacobábád ...	718	606	...	64	1,228
		...	...	1	1	1,519	2,306		471	25,232	Kasmor	828	665	...	81	1,345
				1	1	1,402	1,930		968	34,807	Thul	375	407	...	90	669
		...	...	3	3	4,921	5,838		1,913	89,985		1,921	1,678	...	235	3,242
				1	1	3,714	3,100	Thar and Parkar.		36,947	Umarkot... ...	969	833	...	442	761
				1	1	3,978	2,752		1,107	27,847	Chachrá	1,011	887	...	745	552
				1	1	3,980	1,548			33,259	Nagar Párkar ...	1,680	1,374	...	776	1,037
		1	1	1	1	3,261	2,871		8,508	23,039	Mitti	674	586	...	220	587
				1	1	2,147	1,227			14,524	Diplá	276	247	...	65	279
				1	1	340	1,479		3,114	27,189	Kiprá	64	50	...	14	80
						1,584	1,227			17,956	Sánghar ...	624	499	...	46	865
		1	1	6	6	19,004	14,204		12,729	180,761		5,298	4,476	...	2,308	4,161
		...	...	2	2	9,699	4,331	Native State.	2,708	130,350	Khairpur ...	5,203	4,333	...	2,392	6,809
		...	...	...	...	*189	954	...	...	...	Jodhpur	52	39	...	...	62
		...	...	...	...	...	389	...	...	...	Kachi	...	...	...	...	...
Total Sind Circle.		6	6	50	50	139,515	107,334		49,306	2,322,765		52,245	39,456	213	15,693	68,122

* The Chachrá vaccinator vacinated these Jodhpuris.

9									10					11		12
vaccine operations.									Re-vaccinations.					Percentage of successful cases excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	115	710	795	1,461	43	33	1,537	32	1,230	249	134	1,613	1	97·1	83·1	3,117
...	23	876	646	1,502	19	1	1,522	...	402	78	1	481	...	98·7	83·7	2,003
...	117	204	1,103	1,277	16	21	1,314	7	221	69	10	300	...	98·7	76·2	1,607
...	357	789	1,320	2,076	25	34	2,135	26	1,103	76	51	1,230	...	98·8	93·5	3,339
...	196	805	2,704	3,439	28	54	3,521	12	3,213	572	255	4,040	3	99·1	84·8	7,546
...	69	122	254	363	2	11	376	...	272	23	13	308	...	99·4	92·2	684
...	202	772	1,255	1,993	29	31	2,053	26	560	15	46	621	1	98·5	97·3	2,647
..	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	
...	156	873	763	1,601	15	27	1,643	7	2,059	125	155	2,339	1	99·0	94·2	3,974
...	94	737	1,117	1,792	44	24	1,860	6	1,204	167	144	1,515	6	97·6	87·8	3,363
...	37	1,094	428	1,504	23	13	1,540	18	1,038	15	40	1,093	8	98·4	98·5	2,607
...	23	570	651	1,197	9	26	1,232	11	1,027	38	32	1,097	...	99·2	96·4	2,318
...	75	1,026	1,212	2,209	50	21	2,280	42	832	24	29	885	...	97·7	97·1	3,123
...	58	1,287	719	1,978	75	15	2,068	62	1,831	103	45	1,979	55	96·3	94·6	3,930
...	1,522	9,865	12,967	22,392	378	311	23,081	249	14,992	1,554	955	17,501	75	98·3	90·6	3,096
...	32	786	538	1,319	16	4	1,339	15	585	18	74	677	1	98·8	97·0	2,000
...	67	637	856	1,475	6	14	1,495	2	16	...	10	26	...	99·5	100	1,519
...	23	398	384	780	9	1	790	8	617	1	2	620	...	98·8	99·8	1,402
...	122	1,821	1,778	3,574	31	19	3,624	25	1,218	19	86	1,323	1	99·1	98·4	1,640
...	599	530	1,272	1,668	85	49	1,802	...	1,233	565	114	1,912	...	95·1	68·5	3,714
...	601	603	1,295	1,783	82	65	1,930	32	1,345	493	246	2,084	4	95·6	73·1	3,978
...	1,241	1,089	1,965	2,918	18	125	3,061	7	524	250	152	926	...	99·3	67·7	3,980
...	453	669	591	1,247	...	13	1,260	...	1,045	597	359	2,001	...	100	63·6	3,261
...	179	267	256	520	1	2	523	...	692	929	3	1,624	...	99·8	42·6	2,147
...	20	68	46	97	11	6	114	...	204	17	5	226	...	89·8	92·3	1,924
...	212	422	701	1,102	18	3	1,123	...	401	46	14	461	...	98·3	89·7	
...	3,305	3,648	6,126	9,335	215	263	9,813	39	5,444	2,897	893	9,234	4	97·7	65·2	3,167
...	335	1,675	7,861	9,009	224	340	9,573	37	117	26	20	163	...	97·5	81·8	4,849
...	29	21	70	86	4	1	91	...	61	30	7	98	...	95·5	67·0	‡ ...
....	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
79	7,594	36,525	55,176	88,653	1,578	2,279	92,510	809	38,124	6,220	3,644	47,988	174	98·2	85·9	2,790

‡ The average is given in Upper Sindh Frontier District.

1	2	3		4		5		6		7	8					
												Primary				
												A.		B.		
		Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.						Sex.		Caste.		
Circle.	Name and rank of superintendent.	1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.	Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Males.	Females.	Christian.	Hindu.	Musalman.
Baroda Circle.	G. Edwin Seward, M.D., Surgeon-Major.	1	1	1	1	1,661	1,875	Baroda State.	4,399	112,057	Barodá City ...	907	753	...	1,373	282
				1	1	2,941	2,571			287,379	Pádrá Kumávisí	1,638	1,294	...	2,646	240
				1	1	1,814	1,619			104,939	Dhablhoi Sankhedá	1,019	793	...	1,554	122
				1	1	1,428	1,480			22,588	Sáwalí Wágodiá	807	621	...	1,281	99
				1	1	2,055	1,460			4,255	Senor Koral	1,071	984	...	1,759	253
				1	1	942	774			185,418	Pitlád ...	532	410	...	867	49
				1	1	902	1,096				Piploí ...	527	375	...	852	21
				1	1	1,577	1,097			85,980	Dehagaon Atarsumá	837	740	...	1,450	94
				1	1	1,245	1,117			251,973	Karí ...	689	556	...	1,207	33
		1	1	1	1	1,033	978				Samáwu ...	596	437	...	1,024	9
				1	1	1,670	882			295,562	Pattan ...	895	775	...	1,459	89
				1	1	1,377	1,251				Sidpur ...	779	598		1,093	255
				1	1	1,293	1,517			79,562	Karalu Vadnagar	670	623	...	1,178	103
				1	1	1,580	867			137,248	Vijápur ...	880	700	...	1,478	42
				1	1	1,457	919				Nawasarí ...	755	702	...	1,408	49
				1	1	920	1,044			241,255	Gandewí ...	458	462	...	822	82
				1	1	976	1,294				Palsana ...	477	482	...	786	81
				1	1	750	1,128				Wadá ...	400	350	...	705	13
				1	1	1,129	993				Umreli ...	574	553	...	970	147
				1	1	908	991			142,856	Dámnagar ...	503	389	...	818	43
				1	1	547	901				Corunar ...	287	206	...	476	17
				1	1	891	911				Dharí ...	426	398	...	758	51
				1	1	699	1,016			19,153	Ukhamandal ...	345	349	...	547	100
Total of Baroda Circle.		1	1	23	23	29,795	27,781		4,399	2,000,225		16,072	13,550	...	26,511	2,274
Kutch.	Dorabji Hormasji, C.S.M.C.	1	1	11	11	3,034	2,476	Native State of Kutch.	6,500	487,305	Kutch.	1,548	1,477	2	2,037	980
Aden.	W. Nolan, M. D., Surgeon.	...	...	1	2	1,097	1,265	Aden	11	19,289	Aden.	811	219	6	13	908
Grand Total.		31	30	385	377	704152	622880		18,614	25,033,133		339115	307459	2,635	487630	107686

Details of Column 5.

Total number of persons vaccinated	... 704,152
Deduct persons re-vaccinated ...	... 57,578
Number of persons primarily vaccinated...	646,574

Details of Pri

Total number of operations	
Deduct persons vaccinated	
Number of operations in ex	

9									10					11		12
vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other Castes.	Under one year.	Above one year.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
4	1	923	737	1,462	109	89	1,660	...	...	1	...	1	...	93·0	...	1,661
...	46	1,063	1,869	2,727	100	125	2,952	20	6	2	1	9	...	96·4	75·0	2,941
...	136	954	858	1,611	187	21	1,819	7	...	2	...	2	...	89·5	...	1,814
...	48	458	970	1,333	50	45	1,428	...	...	...	...	...	...	96·3	...	1,428
...	43	725	1,330	1,985	62	8	2,055	...	...	...	...	...	...	96·9	...	2,055
...	26	395	547	842	58	42	942	...	...	...	...	...	...	93·5	...	942
...	29	258	644	748	99	55	902	...	...	...	...	...	...	88·3	...	902
...	33	721	856	1,471	76	30	1,577	...	...	...	...	...	...	95·0	...	1,577
...	5	631	614	1,149	72	24	1,245	...	...	...	...	...	...	94·1	...	1,245
...	...	700	333	923	107	3	1,033	...	...	...	...	...	...	89·6	...	1,033
...	122	945	725	1,494	112	64	1,670	...	...	...	...	...	...	93·0	...	1,670
...	29	423	954	1,253	106	18	1,377	...	...	...	...	...	...	92·2	...	1,377
...	12	771	522	1,146	94	53	1,293	...	...	...	...	...	...	92·4	...	1,293
...	60	797	783	1,352	144	84	1,580	...	...	...	...	...	...	90·3	...	1,580
...	...	278	1,179	1,079	225	153	1,457	...	...	...	...	...	...	82·7	...	1,457
...	16	257	663	900	10	10	920	...	...	...	...	...	...	98·9	...	920
...	92	249	710	856	62	42	960	1	9	5	3	17	...	93·2	64·2	976
5	27	186	564	598	90	62	750	...	...	...	...	...	...	86·9	...	750
...	10	524	603	972	76	84	1,132	5	2	...	...	2	...	92·7	100	1,129
...	31	603	289	863	14	26	903	11	16	...	...	16	...	98·4	100	908
...	...	267	226	425	28	108	561	68	25	16	13	54	...	93·8	60·9	547
...	15	346	478	784	16	24	824	...	67	...	...	67	...	98·0	100	891
...	47	322	373	596	34	81	711	17	8	...	1	9	4	94·6	100	699
9	828	12,796	16,826	26,569	1,931	1,251	29,751	129	133	26	18	177	4	93·2	83·6	1,295
6	...	648	2,377	2,792	180	53	3,025	...	3	6	...	9	...	93·9	33·3	275
Jews. 87	16	154	876	785	129	116	1,030	...	41	8	18	67	...	85·8	83·6	1,097
1,071	47,552	280394	366180	612945	21,485	17,332	651762	5,188	43,957	9,247	4,586	57,790	212	96·6	82·6	1,828

mary Vaccinations.

(Col. 9 E.)	...	651,762
...	...	646,574
cess of persons.		5,188

Details of Re-vaccinations.

Total number of operations (Col. 10 D)	...	57,790
Deduct persons re-vaccinated	...	... 57,578
Number of operations in excess of persons	..	212

A.—VACCINE DEPARTMENT.

CIVIL.

STATEMENT No. II., showing the Monthly Number and Results of the Vaccinations performed in each Circle of Superintendence in the Bombay Presidency during the year 1874-75.

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		In primary vaccination.	In re-vaccination.
Presidency Circle.	April 1874 ...	Whole Circle.	1,253	1,044	150	81	1,275	88·8	72·2
	May ,, ...	Do.	1,395	1,258	128	51	1,437	93·4	67·3
	June ,, ...	Do.	1,259	1,044	121	121	1,286	96·7	46·7
	July ,, ...	Do.	856	758	69	37	864	95·6	56·9
	August ,, ...	Do.	1,000	892	85	26	1,003	97·6	24·7
	September ,, ...	Do.	867	743	111	17	871	93·2	51·9
	October ,, ...	Do.	904	798	103	14	915	93·6	25·3
	November ,, ...	Do.	1,088	1,000	92	10	1,102	96·2	48·5
	December ,, ...	Do.	1,702	1,584	101	25	1,710	96·2	61·4
	January 1875 ...	Do.	1,547	1,451	94	15	1,560	96·4	55·7
	February ,, ...	Do.	1,481	1,401	98	8	1,507	95·9	60·5
	March ,, ...	Do.	1,355	1,209	89	75	1,373	95·8	61·7
		Total ...	14,707	13,182	1,241	480	14,903	95 0	54·0
Central Circle.	April 1874 ...	Whole Circle.	10,361	9,775	433	309	10,517	95·9	62·7
	May ,, ...	Do.	10,799	10,287	361	278	10,926	96·7	57·7
	June ,, ...	Do.	9,069	8,659	354	155	9,168	96·3	65·7
	July ,, ...	Do.	9,172	8,732	330	215	9,277	96·5	54·1
	August ,, ...	Do.	9,495	9,056	291	230	9,577	97·0	69·2
	September ,, ...	Do.	9,562	9,029	352	245	9,626	96·4	61·7
	October ,, ...	Do.	9,923	9,462	353	198	10,013	96·6	59·3
	November ,, ...	Do.	10,376	9,948	281	230	10,459	97·4	65·7
	December ,, ...	Do.	12,276	11,875	262	224	12,361	98·1	57·3
	January 1875 ...	Do.	11,833	11,448	280	199	11,927	97·9	63·4
	February ,, ...	Do.	11,904	11,563	278	151	11,992	98·0	60·7
	March ,, ...	Do.	11,305	10,992	243	175	11,410	98·4	47·1
		Total ...	126,075	120,826	3,818	2,609	127,253	97·2	59·4

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		In primary vaccination.	In re-vaccination.
Southern Circle.	April 1874	Whole Circle.	9,561	8,780	480	406	9,666	95·5	76·4
	May ,,	Do.	9,332	8,600	391	437	9,428	95·9	51·4
	June ,,	Do.	8,830	8,277	306	314	8,897	96·8	56·3
	July ,,	Do.	8,063	7,506	361	279	8,146	96·3	55·7
	August ,,	Do.	7,421	6,844	330	319	7,493	96·1	53·8
	September ,,	Do.	7,810	7,294	339	244	7,877	96·2	50·0
	October ,,	Do.	7,855	7,424	278	243	7,945	96·9	57·3
	November ,,	Do.	9,098	8,609	268	270	9,147	97·5	67·1
	December ,,	Do.	10,324	9,769	254	366	10,389	97·8	59·0
	January 1875	Do.	9,946	9,422	251	326	9,999	97·7	65·2
	February ,,	Do.	9,942	9,428	244	334	10,006	98·1	44·6
	March ,,	Do.	11,260	10,485	398	420	11,303	97·1	47·4
		Total	109,442	102,438	3,900	3,958	110,296	96·9	59·7
Western Circle.	April 1874	Whole Circle.	7,482	6,796	474	321	7,591	94·3	47·8
	May ,,	Do.	7,322	6,622	505	278	7,405	93·3	52·8
	June ,,	Do.	6,143	5,656	324	228	6,208	95·2	41·6
	July ,,	Do.	5,868	5,362	338	218	5,918	94·3	58·9
	August ,,	Do.	6,154	5,740	327	152	6,219	94·7	60·7
	September ,,	Do.	5,882	5,399	334	217	5,950	94·3	71·1
	October ,,	Do.	6,329	5,894	287	226	6,407	95·4	79·1
	November ,,	Do.	6,528	6,132	254	233	6,619	96·0	90·9
	December ,,	Do.	7,468	7,123	250	166	7,539	96·8	75·2
	January 1875	Do.	7,268	6,963	230	134	7,327	97·2	65·2
	February ,,	Do.	7,196	6,763	362	123	7,248	95·5	49·4
	March ,,	Do.	7,193	6,779	348	123	7,250	95·8	42·0
		Total	80,833	75,229	4,033	2,419	81,681	95·3	57·5
Eastern Gujarath Circle.	April 1874	Whole Circle.	8,505	7,978	401	167	8,546	96·6	57·1
	May ,,	Do.	8,613	8,222	353	119	8,694	96·3	72·6
	June ,,	Do.	7,375	7,091	279	46	7,416	96·8	59·3
	July ,,	Do.	5,786	5,519	262	53	5,834	95·9	71·0
	August ,,	Do.	4,590	4,395	211	17	4,623	95·6	82·8
	September ,,	Do.	4,649	4,418	243	25	4,686	94·9	81·3
	October ,,	Do.	5,427	5,208	240	34	5,482	95·9	72·7
	November ,,	Do.	6,382	6,231	124	64	6,419	98·1	89·8
	December ,,	Do.	8,171	7,967	166	60	8,193	98·5	71·2
	January 1875	Do.	9,924	9,687	178	79	9,944	98·6	67·3
	February ,,	Do.	7,725	7,519	169	60	7,748	98·3	70·0
	March ,,	Do.	9,004	8,715	240	91	9,046	97·6	77·5
		Total	86,151	82,950	2,866	815	86,631	97·1	69·7

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		In primary vaccination.	In re-vaccination.
Western Gujarath Circle.	April 1874	Whole Circle.	9,543	8,744	454	424	9,622	95·5	78·4
	May ,,	Do.	9,691	8,510	554	706	9,770	94·3	66·3
	June ,,	Do.	8,041	7,267	463	399	8,129	94·4	77·6
	July ,,	Do.	8,474	7,933	362	234	8,529	95·9	75·6
	August ,,	Do.	7,570	6,992	421	209	7,622	94·5	80·0
	September ,,	Do.	7,074	6,475	442	207	7,124	93·8	85·8
	October ,,	Do.	10,855	10,054	467	439	10,960	95·8	74·0
	November ,,	Do.	9,862	9,352	319	254	9,925	97·1	75·9
	December ,,	Do.	9,921	9,458	273	229	9,960	97·4	86·1
	January 1875	Do.	9,930	9,301	341	315	9,957	97·1	74·2
	February ,,	Do.	10,151	9,663	259	272	10,194	97 6	86·4
	March ,,	Do.	12,391	11,428	441	570	12,439	96·4	79·2
		Total	113,503	105,177	4,796	4,258	114,231	95·9	78·5
Sindh Circle.	April 1874	Whole Circle	11,129	10,603	318	332	11,253	98·4	76·8
	May ,,	Do.	12,556	11,605	538	517	12,660	98·1	78·4
	June ,,	Do.	10,758	10,240	372	261	10,873	98·1	82·2
	July ,,	Do.	10,215	9,481	444	423	10,348	97·7	87·2
	August ,,	Do.	8,694	7,832	432	503	8,767	97·4	87·4
	September ,,	Do.	9,188	8,274	656	342	9,272	97·5	83 3
	October ,,	Do.	9,917	9,033	553	399	9,985	97 7	87·8
	November ,,	Do.	11,880	10,918	673	418	12,009	98·3	86·9
	December ,,	Do.	12,934	11,868	633	476	12,977	99·0	90·0
	January 1875	Do.	13,608	12,298	713	630	13,641	99·2	89·3
	February ,,	Do.	14,214	12,523	899	815	14,237	99·2	87·5
	March ,,	Do.	14,422	12,102	1,567	807	14,476	98·4	80·5
		Total	139,515	126,777	7,798	5,923	140,498	98·2	85·9
Baroda Circle.	April 1874	Whole Circle	2,771	2,516	139	120	2,775	94·8	90·0
	May ,,	Do.	2,090	1,832	166	98	2,096	91·0	85·0
	June ,,	Do.	2,286	1,922	233	135	2,290	89·1	88·5
	July ,,	Do.	2,222	1,938	249	61	2,248	87·0	64·0
	August ,,	Do.	2,146	1,868	195	114	2,177	90·6	37·5
	September ,,	Do.	2,062	1,833	182	76	2,091	88·9	100·
	October ,,	Do.	2,193	1,976	155	74	2,205	92·4	...
	November ,,	Do.	2,278	2,083	116	83	2,282	94·8	66·4
	December ,,	Do.	2,813	2,560	130	129	2,819	95·1	90·4
	January 1875	Do.	2,820	2,642	109	74	2,825	96·0	83·3
	February ,,	Do.	2,864	2,596	127	145	2,868	95·3	100·
	March ,,	Do.	3,250	2,936	156	160	3,252	94·9	50·0
		Total	29,795	26,702	1,957	1,269	29,928	93·2	83·6

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated	Results.			Total.	Average percentage successful, excluding those "unknown."	
				Successful.	Unsuccessful, including "doubtful."	Unknown.		In primary vaccination.	In re-vaccination.
Kutch Circle.	April 1874...	A portion of the circle.	340	312	26	2	340	92·3	...
	May ,, ...		294	278	14	2	294	95·2	...
	June ,, ...		268	242	21	5	268	95·0	...
	July ,, ...		238	229	8	1	238	96·6	...
	August ,, ...		181	170	8	3	181	95·5	...
	September ,, ...		194	166	19	9	194	89·7	...
	October ,, ...		255	227	18	10	255	92·6	...
	November ,, ...		239	230	5	4	239	97·8	100
	December ,, ...		294	280	13	1	294	95·5	...
	January 1875...		297	261	22	14	297	93·2	...
	February ,, ...		225	211	13	1	225	94·1	...
	March ,, ...		209	189	19	1	209	92·1	...
		Total ...	3,034	2,795	186	53	3,034	93·9	33·3
Aden Circle.	April 1874...	Aden.	147	127	12	8	147	93·6	71·4
	May ,, ...		137	87	13	37	137	86·5	100
	June ,, ...		132	67	36	29	132	67·0	33·3
	July ,, ...		3	...	3	...	3	...	...
	August ,, ...		9	...	9	...	9	...	...
	September ,, ...		41	34	3	4	41	91·1	100
	October ,, ...		104	81	15	8	104	93·3	100
	November ,, ...		66	40	16	10	66	71·4	...
	December ,, ...		2	2	...	...	2	100	...
	January 1875...		137	115	6	16	137	94·9	100
	February ,, ...		158	134	11	13	158	91·9	100
	March ,, ...		161	139	13	9	161	91·0	100
		Total ...	1,097	826	137	134	1,097	85·8	83·6
		Grand Total...	704,152	656,902	30,732	21,918	709,552	96·6	82·6

A.—VACCINE DEPARTMENT.

STATEMENT No. III., showing Expenditure of Vaccine Department in each Circle of Superintendence in the Bombay Presidency for the year 1874-75.

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
A.—PAID BY GOVERNMENT.	Rs. a. p.	Rs. a. p.			Rs. a. p.
SUPERINTENDENT GENERAL. Salary at Rs. 1,150 per mensem ...	13,800 0 0	13,800 0 0			
Head Clerk at Rs. 80 do. ...	960 0 0	960 0 0			
Clerk at Rs. 40 do. ...	480 0 0	480 0 0			
1 Havaldar and 3 Peons, at Rs. 10 and 8 each per mensem	408 0 0	408 0 0			
Travelling Allowances...	2,807 0 0	2,637 4 0			
Contingencies	1,420 0 0	1,311 3 4			
Postal Charges	150 0 0	112 10 0			
Total ...	20,025 0 0	19,709 1 4			
PRESIDENCY CIRCLE. Superintendent at Rs. 350 per mensem.	4,200 0 0	4,200 0 0			
Native Supdts. at Rs. each mensem.	.....	.....			
Clerk at Rs. per mensem	.....	.....			
Havaldar and Peons at Rs. mensem.	.....	.....			
Conveyance Allowances	360 0 0	360 0 0			
Contingencies	80 0 0	85 14 8			
Postal Charges	15 0 0	5 6 6			
Total ...	4,655 0 0	4,651 5 2			
CENTRAL CIRCLE. Superintendent at Rs. 800 per mensem.	9,600 0 0	5,425 12 8			
6 Native Supdts., 2 at Rs. 100 and 4 at Rs. 75 each per mensem... ...	6,000 0 0	5,655 4 6			
2 Clerks at Rs. 40 and 25 each do...	780 0 0	763 1 6			
1 Havaldar and 9 Peons at Rs. 10, 8, and 7 each per mensem.	912 0 0	912 0 0			
Travelling Allowances	2,289 0 0	396 3 0			
Contingencies	290 0 0	267 1 6			
Postal Charges	350 0 0	383 1 6			
Total ...	20,221 0 0	13,802 8 8			
SOUTHERN CIRCLE. Supdt. at Rs 600 per mensem ...	7,200 0 0	7,200 0 0			
4 Native Supdts at Rs. 75 each do...	3,900 0 0	3,448 11 7			
2 Clerks at Rs. 40 and 25 each do...	780 0 0	780 0 0			
1 Havaldar and 7 Peons at Rs. 10, 8, and 7 each per mensem	744 0 0	738 8 0			
Travelling Allowances...	2,265 0 0	1,692 5 0			
Contingencies	340 0 0	454 14 0			
Postal Charges	300 0 0	395 0 0			
Total ...	15,529 0 0	14,709 6 7			

1	2 Sanctioned.	3 Expended.	4 Total number vaccinated and re-vaccinated.	5 Percentage of success excluding those unknown from the total.	6 Cost of each successful case.
A.—Paid by Government—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Western Circle. Supdt. at Rs. 600 per mensem ...	7,200 0 0	7,200 0 0			
5 Native Supdts., 1 at Rs. 100 and 4 at R. 75 each per mensem	5,700 0 0	4,625 0 0			
2 Clerks at Rs. 40 and 25 each do...	780 0 0	780 0 0			
1 Havaldar and 8 Peons, at Rs. 10, 8, and 7 each per mensem	912 0 0	824 0 0			
Travelling Allowances	2,289 0 0	2,041 1 5			
Contingencies	300 0 0	375 10 2			
Postal Charges	400 0 0	305 14 0			
Total.....	17,581 0 0	16,151 9 7			
Eastern Gujarath Circle. Supdt. at Rs. 450 per mensem ...	5,400 0 0	5,400 0 0			
4 Native Supdts. at Rs 75 each do...	3,900 0 0	3,475 11 4			
2 Clerks at Rs. 40 and 25 each do...	780 0 0	780 0 0			
1 Havaldar and 7 Peons at Rs. 10, 8, and 7 each per mensem	744 0 0	698 1 0			
Travelling Allowances...	2,265 0 0	2,021 9 1			
Contingencies	244 0 0	225 0 9			
Postal Charges	350 0 0	304 10 6			
Total.....	13,683 0 0	12,905 0 8			
Western Gujarath Circle. Superintendent at Rs. 100 per mensem.	1,200 0 0	1,200 0 0			
3 Native Superintendents, 1 at Rs. 100 and 2 at Rs. 75 each per mensem ...	3,000 0 0	2,825 0 0			
2 Clerks at Rs. 40 and 25 each do...	780 0 0	780 0 0			
2 Vaccinators at Rs. 14 each do...	336 0 0	294 10 11			
1 Havaldar and 8 Peons, at Rs. 10, 8, and 7 each per mensem	828 0 0	824 4 9			
Travelling Allowances	2,520 0 0	1,909 4 0			
Contingencies	273 0 0	116 5 3			
Postal Charges	300 0 0	405 7 0			
Total ...	9,237 0 0	8,354 15 11	4,838	96·3	
Sindh Circle. Superintendent at Rs. 600 per mensem.	7,200 0 0	7,200 0 0			
6 Native Superintendents, 1 at Rs. 100 and 5 at Rs. 75 each per mensem.	5,700 0 0	5,373 0 0			
2 Clerks at Rs. 40 and 25 each do...	780 0 0	780 0 0			
1 Havaldar and 9 Peons, at Rs. 10, 8 and 7 each per mensem.	912 0 0	863 0 0			
Travelling Allowances...	2,289 0 0	2,307 0 4			
Contingencies	511 0 0	332 4 0			
Postal Charges	350 0 0	305 8 0			
Total ...	17,742 0 0	17,160 12 4			
Total paid by Government ...	118,673 0 0	107,444 12 3	4,838	96·3	

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success excluding these unknown from the total.	Cost of each successful case.
B.—Paid by Municipalities.	Rs. a. p.	Rs. a. p.			Rs. a. p.
Presidency Circle.					
1 Head Vaccinator at Rs. 45 per mensem.	540 0 0	540 0 0			
6 Vaccinators at Rs. 24 each do...	1,728 0 0	1,726 7 4			
3 Vaccinators at Rs. 18 each do...	648 0 0	637 8 10			
6 Vaccinators at Rs. 14 each do...	1,008 0 0	1,001 7 6			
5 Peons at Rs. 9 each do...	540 0 0	535 9 8			
Contingencies	2,358 0 0	2,357 11 1			
Total ...	6,822 0 0	6,798 12 5	14,707	91·3	0 8 3
Central Circle.					
2 Vaccinators at Puna at Rs. 18½ each per mensem.	444 0 0	444 0 0			
2 Peons at Rs. 7 each do...	168 0 0	168 0 0	2,567	91·5	0 5 8
1 Vaccinator at Khed at Rs. 15 per mensem.	180 0 0	175 0 0			
1 Peon do. at Rs. 5 do...	60 0 0	60 0 0	573	95·7	0 7 5
Contingencies	12 0 0	6 0 0			
1 Vaccinator at Náráyangáon and Uttur at Rs. 8 per mensem ...	96 0 0	63 5 4	290	92·6	0 4 3
1 Vaccinator at Nagar at Rs. 15 do...	180 0 0	150 0 0			
1 Peon do. at Rs. 6 do...	72 0 0	66 6 11	1,107	98·7	0 3 2
1 Vaccinator at Sholápur at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do at Rs. 7 do...	84 0 0	84 0 0	1,429	99·7	0 3 2
Contingencies	...	4 2 0			
1 Vaccinator at Pandharpur at Rs. 18 per mensem.	216 0 0	210 15 6			
1 Peon do. at Rs. 6 do.	72 0 0	65 0 0	1,511	98·8	0 3 0
Contingencies	...	1 0 0			
1 Vaccinator at Barsi at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do at Rs. 6 do.	72 0 0	72 0 0	1,461	93·7	0 3 0
Contingencies	6 0 0	1 8 0			
1 Vaccinator at Sátárá at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do. at Rs. 5 do.	60 0 0	60 0 0	1,069	98·1	0 3 8
Contingencies	...	1 0 0			
1 Vaccinator at Malsiras at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do at Rs. 6 do.	72 0 0	72 0 0	1,040	98·0	0 4 5
Contingencies	24 0 0	24 0 0			
Total...	2,538 0 0	2,448 5 9	11,047	96·3	0 4 0
Southern Circle.					
1 Vaccinator at Belgaum at Rs. 12 per mensem.	144 0 0	144 0 0			
1 Peon do at Rs. 6 do.	72 0 0	72 0 0	1,075	96·7	0 3 5
Contingencies	4 3 9	4 3 9			
1 Vaccinator at Gokák at Rs. 15 per mensem.	180 0 0	180 0 0			
1 Peon do at Rs. 6 do.	72 0 0	72 0 0	949	98·7	0 4 5
Contingencies	6 10 6	6 10 6			
1 Vaccinator at Dhárwád at Rs. 18 per mensem...	216 0 0	216 0 0			
1 Peon do. at Rs. 4 do...	48 0 0	48 0 0	906	97·2	0 4 9

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
B.—Paid by Municipalities—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle—*concld.*					
1 Vaccinator at Hubli at Rs. 15 per mensem	180 9 6	180 9 6			
Contingencies	2 15 5	2 15 5	1,815	96·5	0 1 8
1 Vaccinator at Gadak at Rs. 15 per mensem...	180 0 0	176 0 0	977	96·3	0 3 1
1 Vaccinator at Karwar at Rs. 10 per mensem...	20 0 0	20 0 0	76	96·9	0 5 0
1 Vaccinator at Bágalkot at Rs. 18 per mensem...	216 0 0	216 0 0			
Contingencies	6 2 1	6 2 1	964	98·6	0 3 10
1 Vaccinator at Bijápur at Rs. 10 per mensem...	120 0 0	120 0 0			
1 Peon do. at Rs. 5 do....	60 0 0	60 0 0	1,157	98·4	0 2 10
Contingencies	12 0 0	12 0 0			
1 Vaccinator at Gulatgad at Rs. per mensem...	.....	.....	139	95·5	...
Total.....	1,540 9 3	1,536 9 3	8,058	97·3	0 3 2
Western Circle.					
1 Vaccinator at Thána at Rs. 14 per mensem...	168 0 0	168 0 0	388	83·8	0 14 3
1 Peon do. at Rs. 8 do...	96 0 0	96 0 0			
1 Vaccinator at Panwel and Uran at Rs. 18 per mensem...	216 0 0	216 0 0	1,121	94·5	0 4 6
1 Peon do. at Rs. 7 do...	84 0 0	84 0 0			
1 Vaccinator at Násik at Rs. 15 per mensem...	180 0 0	180 0 0	695	89·8	0 6 7
1 Peon do. at Rs. 6 do...	72 0 0	72 0 0			
1 Vaccinator at Dhuliá at Rs. 15 per mensem...	180 0 0	180 0 0	860	100	0 3 4
Total...	996 0 0	996 0 0	3,064	93·7	0 5 7
Eastern Gujarath Circle.					
1 Vaccinator at Nariad at Rs. 15 per mensem...	180 0 0	180 0 0			
1 Peon do. at Rs. 6 do...	72 0 0	72 0 0	1,183	96·1	0 3 9
Contingencies	12 0 0	12 0 0			
1 Vaccinator at Broach at Rs. 13 per mensem...	156 0 0	156 0 0			
1 Peon do. at Rs. 6 do...	72 0 0	72 0 0	633	99·1	0 6 2
Contingencies	12 0 0	12 0 0			
1 Vaccinator at Surat at Rs. 13 per mensem...	156 0 0	156 0 0			
1 Peon do. at Rs. 6 do...	72 0 0	72 0 0	1,985	88·4	0 2 4
Contingencies	24 0 0	24 0 0			
Total...	756 0 0	756 0 0	3,801	92·6	0 3 6
Western Gujarath Circle.					
2 Vaccinators at Ahmadábád at Rs. 20 each per mensem...	480 0 0	480 0 0			
2 Peons do. at Rs. 7 each do...	168 0 0	168 0 0	5,467	96·4	0 2 0
Contingencies	12 0 0	7 6 0			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
B.—Paid by Municipalities—*concld.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Western Gujarath Circle—*concld.*					
1 Vaccinator at Dholká at Rs. 12 per mensem...	144 0 0	144 0 0			
1 Peon do. at Rs. 6 do...	72 0 0	72 0 0	827	96·2	0 5 3
Contingencies	3 0 0	3 0 0			
1 Vaccinator at Dhanduká at Rs. 15 per mensem...	180 0 0	180 0 0			
1 Peon do. at Rs. 7. do...	84 0 0	84 0 0	1,587	91·8	0 3 2
Contingencies	24 0 0	24 0 0			
1 Vaccinator at Veramgáon at Rs. 12 per mensem...	144 0 0	144 0 0			
1 Peon do. at Rs. 7 do...	84 0 0	84 0 0	764	94·3	0 5 3
Contingencies	3 0 0	3 0 0			
Total...	1,398 0 0	1,693 6 0	8,645	95·3	0 2 9
Sindh Circle.					
2 Vaccinators at Karáchi at Rs. 15 each per mensem...	360 0 0	285 0 0			
Contingencies	75 0 0	49 12 0	4,301	90·4	0 1 4
1 Vaccinator at Shikárpur at Rs. 24 per mensem.	350 12 1	350 12 1			
1 Peon do. at Rs. 6 do...	72 0 0	72 0 0	1,617	88·5	0 4 9
Contingencies	1 12 0	1 12 0			
1 Vaccinator at Sakkar at Rs. 20 per mensem.	240 0 0	240 0 0			
1 Peon do. at Rs. 7 do.	84 0 0	84 0 0	1,339	96·5	0 4 8
Contingencies	36 0 0	36 0 0			
1 Vaccinator at Haidrábád at Rs. 20 per mensem	240 0 0	240 0 0			
1 Peon do. at Rs. 7 do....	84 0 0	84 0 0	2,003	95·1	0 2 11
Contingencies	24 0 0	24 0 0			
1 Vaccinator at Rohri at Rs. 10 do...	70 0 0	70 0 0			
Contingencies	7 0 0	4 8 6	321	98·0	0 3 10
Total..	1,644 8 1	1,541 12 7	9,581	92·1	0 2 9
Aden.					
1 Vaccinator at Rs. 18 per mensem.	216 0 0	216 0 0	1,097	85·7	0 4 2
Total..	216 0 0	216 0 0	1,097	85·7	0 4 2
Total paid by Municipalities..	15,911 1 4	15,686 14 0	60,000	93·8	0 4 7
C.—Paid from Local Funds.					
Central Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
3 do. ,, 18 each do.	648 0 0	627 8 0			
4 do. ,, 14 ,, do.	672 0 0	666 9 0			
8 Peons ,, 7 ,, do.	672 0 0	658 0 0			
Contingencies	192 0 0	110 15 5			
Poona zilhá total.....	2,472 0 0	2,351 0 5	15,046	96·1	0 2

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Central Circle—*contd.*					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
5 do. ,, 18 each do.	1,080 0 0	1,078 0 0			
5 do. ,, 14 ,, do.	840 0 0	839 0 0			
11 Peons ,, 7 ,, do.	924 0 0	924 0 0			
Contingencies	264 0 0	145 3 11			
Ahmadnagar zilhá total...	3,396 0 0	3,274 3 11	23,107	98·3	0 2 3
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
2 do. ,, 18 ,, do.	432 0 0	429 8 0			
3 do. ,, 14 ,, do.	504 0 0	502 0 0			
6 Peons ,, 7 ,, do.	504 0 0	504 0 0			
Contingencies	144 0 0	77 0 6			
Sholápur zilhá total...	1,872 0 0	1,800 8 6	12,348	95·9	0 2 5
1 Vaccinator at Rs. 24 per mensem.	288 0 0	286 0 0			
5 do. ,, 18 each do.	1,080 0 0	1,060 15 3			
6 do. ,, 14 ,, do.	1,008 0 0	1,002 0 0			
12 Peons ,, 7 ,, do.	1,008 0 0	1,008 0 0			
Contingencies	288 0 0	155 11 2			
Sátárá zilhá total...	3,672 0 0	3,512 10 5	28,321	98·9	0 2 0
1 Vaccinator at Rs. 30 per mensem.	360 0 0	356 8 0			
5 do. ,, 18 each do.	1,080 0 0	1,069 0 11			
5 do. ,, 14 ,, do.	840 0 0	838 0 0			
11 Peons ,, 7 ,, do.	924 0 0	924 0 0			
Contingencies	264 0 0	89 1 9			
Ratnágiri zilhá total...	3,468 0 0	3,276 10 8	28,058	95·5	0 1 11
Circle total...	14,880 0 0	14,215 1 11	106,880	96·9	0 2 2
Southern Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	285 0 0			
3 do. ,, 18 each do.	648 0 0	647 0 0			
4 Vaccinators at Rs. 14 each per mensem.	672 0 0	662 0 0			
8 Peons ,, 7 ,, do.	672 0 0	672 0 0			
Contingencies	192 0 0	66 9 10			
Belgaum zilhá total...	2,472 0 0	2,332 9 10	14,138	97·5	0 2 9
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
5 do. ,, 18 each do.	1,080 0 0	1,077 0 0			
5 do. ,, 14 ,, do.	840 0 0	828 0 0			
11 Peons ,, 7 ,, do.	924 0 0	910 0 0			
Contingencies	264 0 0	80 8 5			
Dhárwád zilhá total...	3,396 0 0	3,183 8 5	18,221	94·0	0 3 0

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle—*concld.*					
1 Vaccinator at Rs. 24 per mensem...	288 0 0	288 0 0			
3 do. ,, 18 each do.	648 0 0	647 0 0			
7 do. ,, 14 ,, do.	1,176 0 0	1,068 9 8			
11 Peons ,, 7 ,, do.	924 0 0	872 12 0			
Contingencies	264 0 0	76 14 8			
Kanadá zilhá total...	3,300 0 0	2,953 4 4	15,997	97·1	0 3 1
1 Vaccinator at Rs. 24 per mensem.	288 0 0	284 0 0			
3 do. ,, 18 each do.	648 0 0	639 0 0			
4 do. ,, 14 ,, do.	672 0 0	661 0 0			
8 Peons ,, 7 ,, do.	672 0 0	672 0 0			
Contingencies	192 0 0	66 1 1			
Kaládgi zilhá total...	2,472 0 0	2,322 1 1	16,818	97·1	0 2 4
Circle total...	11,640 0 0	10,791 7 8	65,174	96·3	0 2 10
Western Circle.					
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
5 do. ,, 18 each do.	1,080 0 0	914 8 3			
5 do. ,, 14 ,, do.	840 0 0	790 13 2			
11 Peons ,, 7 ,, do.	924 0 0	900 9 7			
Contingencies	264 0 0	105 13 0			
Thána zilhá total...	3,396 0 0	2,999 12 0	17,103	94·4	0 2 11
1 Vaccinator at Rs. 24 per mensem.	288 0 0	30 15 6			
2 do. ,, 18 each do.	432 0 0	432 0 0			
2 do. ,, 14 ,, do.	336 0 0	464 11 5			
5 Peons ,, 7 ,, do.	420 0 0	434 0 0			
Contingencies	120 0 0	71 10 2			
Kolábá zilhá total...	1,596 0 0	1,433 5 1	8,458	94·6	0 2 10
1 Vaccinator at Rs. 30 per mensem.	360 0 0	290 9 2			
4 do. ,, 18 each do.	864 0 0	700 11 5			
5 do. ,, 14 ,, do.	840 0 0	952 5 7			
10 Peons ,, 7 ,, do.	840 0 0	835 2 7			
Contingencies	240 0 0	92 11 9			
Nasik zilhá total.	3,144 0 0	2,871 8 6	16,740	91·9	0 3 0
1 Vaccinator at Rs. 24 per mensem	288 0 0	288 0 0			
7 do. ,, 18 each do.	1,512 0 0	1,496 3 2			
8 do. ,, 14 ,, do.	1,344 0 0	1,244 10 10			
16 Peons ,, 7 ,, do.	1,344 0 0	1,329 8 9			
Contingencies	384 0 0	136 9 3			
Khándesh zilhá total...	4,872 0 0	4,495 0 0	27,894	97·0	0 2 8
Circle total ..	13,008 0 0	11,799 9 7	70,195	94·9	0 2 10

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Eastern Gujarath Circle. — 1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
3 do. ,, 18 each do.	648 0 0	603 7 11			
4 do. ,, 14 ,, do.	672 0 0	643 10 0			
8 Peons at Rs. 7 each per mensem ...	672 0 0	668 6 2			
Contingencies	192 0 0	110 4 4			
Khedá zilhá total...	2,472 0 0	2,313 12 5	18,421	96·4	0 2 1
1 Vaccinator at Rs. 24 per mensem.	288 0 0	287 11 6			
1 do. ,, 18 each do.	216 0 0	216 0 0			
2 do. ,, 14 ,, do.	336 0 0	335 0 0			
4 Peons ,, 7 ,, do.	336 0 0	336 0 0			
Contingencies	96 0 0	58 4 8			
Broach zilhá total...	1,272 0 0	1,233 0 2	7,916	98·2	0 2 6
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
3 do. ,, 18 each do.	648 0 0	643 0 1			
4 do. ,, 14 ,, do.	672 0 0	637 12 0			
8 Peons ,, 7 ,, do.	672 0 0	663 6 2			
Contingencies	192 0 0	73 9 10			
Surat zilhá total...	2,472 0 0	2,305 12 1	14,308	96·5	0 2 8
1 Vaccinator at Rs. 24 per mensem.	288 0 0	288 0 0			
2 do. ,, 18 each do.	432 0 0	430 14 0			
2 do. ,, 14 ,, do.	336 0 0	314 9 11			
5 Peons ,, 7 ,, do.	420 0 0	419 12 0			
Contingencies	120 0 0	56 7 3			
Panch Mahals total...	1,596 0 0	1,509 11 2	9,897	97 2	0 2 5
Circle total...	7,812 0 0	7,362 3 10	50,542	96·9	0 2 4
Western Gujarath Circle. — 1 Vaccinator at Rs. 24 per mensem.	288 0 0	257 0 0			
3 do. ,, 18 each do.	648 0 0	507 9 7			
3 do. ,, 14 ,, do.	504 0 0	561 0 0			
7 Peons ,, 7 ,, do.	588 0 0	588 0 0			
Contingencies	168 0 0	91 15 10			
Ahmádábád zilhá total...	2,196 0 0	2,005 9 5	14,632	94·3	0 2 4
Circle total...	2,196 0 0	2,005 9 5	14,632	94·3	0 2 4
Sindh Circle. — 1 Vaccinator at Rs. 24 per mensem	288 0 0	288 0 0			
4 Do. ,, 18 each do.	864 0 0	221 8 0			
4 Do. ,, 14 ,, ...	672 0 0	940 9 7			
9 Peons ,, 7 ,, ...	756 0 0	601 8 9			
Superintendent's allowance ...	511 0 0	510 10 0			
Contingencies	756 0 0	546 9 8			
Karáchi zilhá total ...	3,847 0 0	3,108 14 0	17,955	96·1	0 2 11

1		2			3			4	5	6		
		Sanctioned.			Expended.			Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.		
C.—Paid from Local Funds.—*contd.*		Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Sindh Circle—*concld.*	1 Vaccinator at Rs. 24 per mensem	288	0	0	259	3	2					
	6 Do. „ 18 each do.	1,296	0	0	1,022	0	0					
	6 Do. „ 14 „ do...	1,008	0	0	1,114	5	4					
	13 Peons „ 7 „ do...	1,092	0	0	1,065	11	5					
	Superintendent's allowance ...	741	0	0	740	12	0					
	Contingencies	1,092	0	0	914	9	2					
	Shikárpur Zilhá total ...	5,517	0	0	5,116	9	1	39,911	97·1	0	2	2
	2 Vaccinators at Rs. 24 and 30 per mensem	648	0	0	593	15	10					
	5 Do. „ 18 each do.	1,080	0	0	896	12	8					
	5 Do. „ 14 „ do.	840	0	0	633	6	5					
	12 Peons „ 7 „ do.	1,008	0	0	60	4	8					
	Superintendent's allowance ...	548	10	0	548	10	0					
	Contingencies	288	0	0	110	5	9					
	Haidrábád zilhá total ...	4,412	10	0	2,843	7	4	38,255	95·0	0	1	3
	1 Vaccinator at Rs. 24 per mensem	288	0	0	283	0	0					
	2 Do. „ 18 each do.	432	0	0	343	9	7					
	3 Do. „ 14 „ do.	504	0	0	502	8	0					
	6 Peons „ 7 „ do.	504	0	0	445	11	11					
	Contingencies	144	0	0	116	6	9					
	Thar and Párkar total ...	1,872	0	0	1,691	4	3	19,193	82·5	0	1	9
	1 Vaccinator at Rs. 24 per mensem.	288	0	0	281	0	0					
	1 Do. „ 18 do. ...	216	0	0	.....							
	1 Do. „ 14 do. ...	168	0	0	279	0	0					
	3 Peons „ 7 each do. ...	252	0	0	227	11	9					
	Contingencies	72	0	0	31	10	1					
	Upper Sindh Frontier total ...	996	0	0	819	5	10	4,921	98·9	0	2	8
	Circle total ...	16,644	10	0	13,579	8	6	120,235	94·1	0	1	11
	Total paid from Local Funds ...	66,180	10	0	59,753	8	11	427,658	95·6	0	2	4
D.—Paid by Native Chiefs or Landlords.												
Central Circle.	1 Vaccinator by Akalkot State at Rs. 15 per mensem.	180	0	0	180	0	0					
	1 Peon do. at Rs. 6 do ...	72	0	0	72	0	0	1,805	95·7	0	3	1
	Contingencies	72	0	0	72	0	0					
	2 Vaccinators by Bhor State at Rs. 21 and 14 per mensem ...	420	0	0	224	8	0					
	2 Peons do. at Rs. 4½ do...	108	0	0	53	0	0	1,945	98·2	0	2	7
	Contingencies	48	0	0	26	14	6					

	1	2	3	4	5	6
		Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
	D.—Paid by Native Chiefs or Landlords—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Central Circle—*contd.*	1 Vaccinator by Jat State at Rs. 12 per mensem.	144 0 0	144 0 0			
	1 Peon do at Rs. 1 do. ...	12 0 0	12 0 0	1,554	100·0	0 1 8
	Contingencies	6 0 0	6 0 0			
	1 Vaccinator by Phaltan State at Rs. 15 per mensem.	180 0 0	176 0 0			
	1 Peon do at Rs. 4 do ...	48 0 0	48 0 0	1,229	95·3	0 3 2
	1 Vaccinator by Atpadi State at Rs. 15-9-4 per mensem.	187 0 0	187 0 0			
	1 Peon do. at Rs. 5 do ...	60 0 0	60 0 0	1,615	95·1	0 2 9
	Contingencies	2 0 0	2 0 0			
	Circle Total ...	1,539 0 0	1,263 6 6	8,148	97·0	0 2 7
Southern Circle.	1 Vaccinator by Sáwantwádi State at Rs. 20 per mensem.	240 0 0	240 0 0			
	4 Peons do. at Rs. 7 do ...	336 0 0	336 0 0	7,543	94·0	0 1 3
	Contingencies	6 15 3	6 15 3			
	4 Vaccinators by Sángli State at Rs. 22 and 12 per mensem.	576 0 0	575 8 0			
	4 Peons do. at Rs. 7 do. ...	266 0 0	266 0 0	3,469	94·1	0 4 6
	Contingencies	55 5 6	55 5 6			
	3 Vaccinators by Miráj State at at Rs. 15-11-6 and 8 per mensem	438 0 0	438 0 0			
	2 Peons do. at Rs. 6 and 5-14-0 do.	142 8 0	142 8 0	1,694	94·4	0 6 2
	Contingencies	2 10 0	2 10 0			
	2 Vaccinators by Kurandwad State at Rs. 8 and 12 per mensem.	240 0 0	240 0 0			
	2 Peons do. at Rs. 5 and 6 do.	132 0 0	132 0 0	1,823	93·9	0 3 6
	Contingencies	7 9 0	7 9 0			
	1 Vaccinator by Mudhol State at Rs. 18 per mensem.	216 0 0	187 0 0			
	1 Peon do. at Rs. 6 do. ...	72 0 0	66 0 0	1,522	98·0	0 2 8
	1 Vaccinator by Rámdurg State at Rs. 11-3-9 per mensem.	134 13 0	134 13 0			
	1 Peon do. at Rs. 3-12-0 do...	45 0 0	45 0 0	420	99·2	0 6 10
	2 Vaccinators by Jamkhandi State at Rs. 19 and 14 per mensem.	389 0 0	389 0 0			
	2 Peons do. at Rs. 7 do. ...	168 0 0	168 0 0	2,082	94·8	0 4 7
	Contingencies	7 8 9	7 8 9			
	1 Vaccinator by Sávanur State at Rs. 15 per mensem.	180 0 0	178 0 0			
	1 Peon do. at Rs. 7 do. ...	84 0 0	84 0 0	570	91·8	0 8 3
	Contingencies	7 14 5	7 14 5			
	1 Native Superintendent in Kolhápur State at Rs. 75 per mensem.	900 0 0	854 13 4			
	1 Peon do. at Rs. 5 do. ...	60 0 0	60 0 0			
	Contingencies	24 0 0	24 0 0			
	1 Vaccinator by Kolhápur State at Rs. 25 per mensem...	300 0 0	299 2 0			
	1 Do. 22 do. ...	264 0 0	264 0 0			

1			2			3			4	5	6		
			Sanctioned.			Expended.			Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.		
	D.—Paid by Native Chiefs or Landlords—*contd.*		Rs.	a.	p.	Rs.	a	p.			Rs.	a.	p.
Southern Circle—*contd.*	1	Vaccinator by Kolhápur State at Rs. 18 per mensem.	216	0	0	90	7	8	17,087	97·6	0	3	8
	4	Do. 16 each do. ...	768	0	0	766	0	0					
	1	Do. 15 do. ...	180	0	0	180	0	0					
	3	Do. 14 each do. ...	504	0	0	504	0	0					
	11	Peons 5 do. ...	660	0	0	648	0	0					
		Contingencies	54	15	0	54	15	0					
		Circle Total ..	7,678	2	11	7,455	1	11	36,210	96·1	0	3	6
Western Circle.	1	Vaccinator by Jawár State at Rs. 20 per mensem.	240	0	0	240	0	0	1,903	96·9	0	2	2
	2	Do. by Janjirá State at Rs. 12 each do....	288	0	0	288	0	0	4,310	93·7	0	1	1
	1	Do. by Penth State at Rs. 17-8-0 do ...	210	0	0	210	0	0	1,361	98·3	0	3	8
	1	Peon do. at Rs. 6 do ...	72	0	0	72	0	0					
		Circle Total ...	810	0	0	810	0	0	7,574	95·3	0	1	10
Eastern Gujarath Circle.	2	Vaccinators by H. H. the Mahárájá of Idar at Rs. 20 each per mensem...	480	0	0	480	0	0					
	2	Peons do at Rs. 5 and 6 do.	132	0	0	132	0	0	3,937	96·9	0	2	8
		Contingencies	24	0	0	24	0	0					
	3	Vaccinators by Mahi Kánthá thákurs at Rs. 20 each per mensem...	720	0	0	648	0	0					
		Contingencies	36	0	0	36	0	0	5,519	96·9	0	2	0
	2	Vaccinators by Lunwádá at Rs. 18 each per mensem...	432	0	0	427	0	0					
	2	Peons do. at Rs. 5¼ each do.	126	0	0	126	0	0	2,656	96·4	0	3	5
		Contingencies	5	4	0	5	4	0					
	1	Vaccinator by Rájpiplá at Rs. 18- 6-0 per mensem.	220	8	0	220	8	0					
	1	Do. 15-12-0 do...	189	0	0	173	4	0					
	2	Peons do. at Rs. 4-6-0 and 4 each per mensem.	100	8	0	100	8	0	3,251	98·0	0	2	6
		Contingencies	5	4	0	5	4	0					
	1	Vaccinator by Bálásinur at Rs. 13-2-0 per mensem.	157	8	0	157	8	0					
	1	Peon do. at Rs. 3-8-0 do ...	42	0	0	42	0	0	1,150	83·0	0	3	5
		Contingencies	2	10	0	2	10	0					
	1	Vaccinator by Deogad Báriá at Rs. 20 per mensem.	240	0	0	239	2	3					
	1	Do. 18 do ...	216	0	0	180	0	0	4,067	98·3	0	2	2
	2	Peons do. at Rs. 5-4-0 each per mensem.	126	0	0	126	0	0					
		Contingencies	5	4	0	5	4	0					
	1	Vaccinator by Sunth and Kadáná at Rs. 18 per mensem.	216	0	0	207	0	0					
	1	Peon do. at Rs. 5.4-0 do....	63	0	0	63	0	0	1,006	91·1	0	4	9
		Contingencies	2	10	0	2	10	0					

	1	2			3			4	5	6		
		Sanctioned.			Expended.			Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.		
	D.—Paid by Native Chiefs or Landlords—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Eastern Gujarath Circle—*contd.*	1 Vaccinator by Chotá Udaipur at Rs. 18 per mensem.	216	0	0	216	0	0					
	1 Peon do. at Rs. 5-4-0 do. ...	63	0	0	63	0	0	969	92.7	0	4	11
	Contingencies	2	10	0	2	10	0					
	1 Vaccinator by Sankhedá Mewás at Rs. 18 per mensem.	216	0	0	216	0	0					
	1 Peon do. at Rs. 5-4-0 do.	63	0	0	63	0	0	774	94·1	0	6	2
	Contingencies	2	10	0	2	10	0					
	1 Vaccinator by Cambay at Rs 20 per mensem.	240	0	0	240	0	0					
	1 Peon do. at Rs. 4-8-0 do ...	54	0	0	54	0	0	2,684	97·8	0	1	9
	1 Vaccinator by Dharmpur at Rs 15 per mensem.	180	0	0	180	0	0					
	1 Peon do. at Rs. 6 do...	72	0	0	72	0	0	3,668	99·2	0	1	2
	Contingencies	18	0	0	18	0	0					
	1 Vaccinator by Bánsdá at Rs. 15 per mensem...	180	0	0	180	0	0					
	1 Peon do. at Rs. 6 do ...	72	0	0	72	0	0	2,127	98·1	0	2	1
	Contingencies	18	0	0	18	0	0					
	Circle Total ...	4,938	12	0	4,800	2	3	31,808	96·7	0	2	6
Western Gujarath Circle.	2 Vaccinators by Pálanpur at Rs. 22 and 15 per mensem.	444	0	0								
	2 Peons do. at Rs. 5 each do.	120	0	0								
	Contingencies	12	0	0								
	1 Vaccinator by Rádhanpur at Rs. 18 per mensem,	216	0	0								
	1 Peon do. at Rs. 5 do ...	60	0	0								
	1 Vaccinator by Thákurs of Wáw, Tharád, Morwádá, Sántalpur Charchat, Wárye, Deodar, Bhabhar, Tehrwada and Suigám at Rs. 22 per mensem.	264	0	0								
	1 Peon do. at Rs. 5 do ...	60	0	0								
	2 Vaccinators by Fine Fund of the Political Superintendency of Pálanpur at Rs. 20 and 18 per mensem.	456	0	0								
	2 Peons do. at Rs. 6 each do.	144	0	0								
	Pálanpur States Total...	1,776	0	0	1,678	0	0	11,570	95·3	0	2	6
	Paid by Native Chiefs of Kathewád.											
	1 Vaccinator at Rs. 30 per mensem	360	0	0	319	0	0					
	3 Do. ,, 25 each do...	900	0	0	539	0	0					
	1 Do. ,, 20 do...	240	0	0	230	0	0					
	5 Do. ,, 18 each do...	1,080	0	0	1,063	4	1					
	7 Do. ,, 15 ,, do...	1,260	0	0	1,200	10	0					
	16 Do. ,, 14 ,, do...	2,688	0	0	2,378	12	3					
	33 Peons ,, 7 ,, do...	2,772	0	0	2,535	6	11					

	1	2			3			4	5	6		
		Sanctioned.			Expended.			Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.		
	D.—Paid by Native Chiefs or Landlords—*contd.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
	Paid by Native Chiefs of Kathewád.											
Western Gujarath Circle—*contd.*	8 Candidate Vaccinators at Rs. 4 and 6 each per mensem.	384	0	0	110	4	11					
	Chief's allowance to Superintendent at Rs. 50 per mensem...	600	0	0	600	0	0					
	4 Agents at Rs. 5 each do. ...	240	0	0	235	0	0					
	Allowance to Local Fund accountant for keeping the account at Rs. 20 per mensem.	240	0	0	120	0	0					
	Bhattá to Vaccinators	2,040	0	0	1,651	0	0					
	Allowance for training Candidates at Rs. 5 per mensem	15	0	0	15	0	0					
	Contingencies	354	13	6	354	13	6					
	Kathewád States Total...	13,173	13	6	11,352	3	8	73,818	95·9	0	2	7
	Circle Total...	14,949	13	6	13,030	3	8	85,388	95·2	0	2	7
Sindh Circle.	2 Vaccinators by Mir Ali Murád of Khairpur at Rs. 25 each per mensem.	600	0	0	600	0	0					
	2 Peons do. at Rs. 7 each do.	168	0	0	168	0	0	9,699	97·3	0	1	4
	Circle Total ...	768	0	0	768	0	0	9,699	97·3	0	1	4
	Paid by H. H. the Gaikawád of Barodá.											
Baroda Circle.	1 Native Inspector at Rs. 27 per mensem.	324	0	0	324	0	0					
	Travelling allowance to do. at Rs. 27 do...	324	0	0	324	0	0					
	Bhattá to do. for 6 months at Rs. 15 do ..	90	0	0	90	0	0					
	1 Vaccinator at Rs. 25 do...	300	0	0	300	0	0					
	6 do. ,, 18 each do...	1,296	0	0	1,296	0	0					
	11 do. ,, 15 ,, do...	1,980	0	0	1,980	0	0					
	Contingent allowance to the Inspector and Vaccinators at Rs. 10 per mensem.	120	0	0	120	0	0					
	1 English and Vernacular Clerk at Rs. 30 per mensem.	360	0	0	360	0	0					
	2 Peons at Rs. 9 each do. ...	216	0	0	216	0	0					
	18 Do. ,, 7 ,, per mensem.	1,512	0	0	1,512	0	0					
	For Kathewád Districts.											
	1 Vaccinator at Rs. 35-10-0 per mensem	427	8	0	427	8	0					
	1 Do. ,, 22 do...	264	0	0	264	0	0					
	3 Do. ,, 20 each do ..	720	0	0	720	0	0					
	5 Peons ,, 8 ,, do...	480	0	0	480	0	0					
	Total Barodá Rs...	8,413	8	0	8,413	8	0					
	Equivalent to British Rs.	7,085	1	0	7,085	1	0					
	Circle Total...	7,085	1	0	7,085	1	0	29,795	93·1	0	4	2

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success excluding those unknown from the total.	Cost of each successful case.
D.—Paid. by Native Chiefs or Landlords—*concluded.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Paid by H. H. the Rao of Kutch.					
Kutch Circle.					
1 Assistant Superintendent at Rs. 10-14-2 per mensem.	130 10 0	130 10 0			
Travelling bhattá to do. at Rs. 7-14-8 per mensem...	95 0 0	71 12 3			
Pony expense to do. at Rs. 11-14-0 per mensem...	142 8 0	103 4 9			
1 Peon at Rs. 3-10-0 do. ...	43 8 0	38 4 2			
Travelling bhattá to do. at Rs. 5-15-0 per mensem...	71 4 0	34 2 9			
1 Vaccinator at Bhuj at Rs. 3-10-0 per mensem...	21 12 0	21 12 0			
1 Do. at Mándvi at Rs. 7-4-2 per mensem...	43 9 0	43 9 0			
1 Do. at Mundhrá at Rs. 12-1-6 per mensem...	145 2 0	145 2 0			
3 Do. at Rs. 7-4-2 each do.	261 6 0	259 6 5			
Do. travelling bhattá at Rs. 7-14-8 per mensem...	285 0 0	266 7 11			
Do. Pony expense at Rs. 11-14-0 per mensem...	427 8 0	389 8 3			
3 Peons at Rs. 3-10-0 each do. ...	130 8 0	74 0 2			
Travelling bhattá to do. at Rs. 5-15-0 each per mensem...	213 12 0	121 1 7			
Total ...	2,011 7 0	1,699 1 3	2,339	93·6	0 12 8
Paid by Bhayads.					
2 Vaccinators at Rs. 10 each per mensem.	240 0 0	240 0 0			
1 Do. ,, 7-14-8 do...	95 0 0	95 0 0			
Do. bhattá ,, 7-14-8 do...	95 0 0	95 0 0			
Do. Pony expense Rs. 3-15-4 per mensem...	47 8 0	47 8 0			
1 Peon at Rs. 2-10-2 per mensem.	31 10 0	31 10 0			
Do. bhattá Rs. 3-15-4 do...	47 8 0	47 8 0			
1 Vaccinator ,, 10 do...	120 0 0	120 0 0			
1 Peon ,, 4 do...	48 0 0	48 0 0			
1 Vaccinator ,, 7-14-8 do...	95 0 0	95 0 0			
Do. bhattá ,, 3-15-0 do..	47 8 0	47 8 0			
Total ...	867 2 0	867 2 0	695	94·1	1 5 2
Circle Total ..	2,878 9 0	2,566 3 3	3,034	93·7	0 14 8
Total paid by Native Chiefs or Landlords	40,844 6 5	37,778 2 7	211,656	95·6	0 3 1
Grand Total ...	2,41,609 1 9	2,20,663 5 9	704,152	95·5	0 5 4

A.—VACCINE DEPARTMENT.

STATEMENT No. IV., showing results of the year 1874-75, *as compared with those of each of the previous five years in the Bombay Presidency.*

1	2	3	4	5				6	7	8	9
				Number of Vaccinators.							
Year.	Total number of persons vaccinated and re-vaccinated.	Number successful.	Ratio per cent. successful, excluding those "unknown" from the total.	A. Paid by state.	B. Paid from other sources.	C. Total.	D. No. previously employed as inoculators or private practitioners.	Cost of whole vaccine establishment.	Cost of travelling allowances and contingencies.	Total cost.	Cost of each successful case.
								Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
1869-70	424,774	397,622	96·7	134	141	275	None.	1,18,389 0 0	17,812 0 0	1,36,201 0 0	0 5 6
1870-71	491,605	447,048	95·0	134	192	326		1,42,536 0 0	27,515 0 0	1,70,051 0 0	0 6 0
1871-72	526,402	484,095	94·8	3	370	373		1,56,331 0 0	28,128 5 2	1,84,459 5 2	0 6 1
1872-73	561,196	504,263	93·9	2	371	373		1,77,848 4 0	32,946 12 11	2,10,795 0 11	0 6 8
1873-74	622,880	558,304	94·1	2	376	378		1,85,607 12 3	30,468 12 1	2,16,076 8 4	0 6 2
1874-75	704,152	656,902	95·5	2	383	385		1,91,419 4 9	29,244 1 0	2,20,663 5 9	0 5 4

B.

DISPENSARY VACCINATION.

B.— DISPENSARY

STATEMENT No. V., showing particulars of Vaccination in the Dispensaries in

1	2	3		4		5		6	7	8	Primary				
											A.			B.	
											Sex.			Caste	
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Muslman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.								
Central Circle.	P. S. Turnbull, M.D., Surgeon-Major; Officiating J. Pinkerton, M.D., Surgeon-Major.	...	...	...	...	...	1,147	Púna. Púná Town...	...	Dispensary...	...	...	...	...	...
		...	...	...	...	209	290	Juner ...	10,298	Do.	101	108	1	162	46
		...	...	...	...	98	85	Indápur ...	7,740	Do.	50	48	1	88	7
		...	...	...	...	159	142	Sáswad ...	6,416	Do.	72	86	...	153	5
		...	...	...	...	178	186	Sirúr ...	5,049	Do.	91	87	2	108	34
		...	...	...	...	135	56	Jejuri ...	3,102	Do.	65	70	...	117	10
		...	...	...	...	125	...	Bárámati ...	4,975	Do.	63	62	...	108	17
		...	...	...	...	6	...	Khed ...	6,446	Do.	5	1	...	6	...
		...	...	...	...	17	...	Talegaon ...	5,040	Do.	10	7	...	16	1
		...	...	...	...	927	1,906		49,066		457	469	4	758	120
		...	...	...	...	8	...	Ahmadnagar. Ahmadnagar Jail.	.....	Jail ...	8	...	...	8	...
		...	...	...	...	74	72	Ahmadnagar	32,841	Dispensary...	49	25	2	59	13
		..	...	...	...	90	73	Sangamner...	9,978	Do.	54	36	...	63	27
		...	...	...	...	172	145		42,819		111	61	2	130	40
		...	...	...	...	20	...	Sholapur. Sholapur Jail.		Jail ...	9	1	1	8	1
		...	...	...	...	574	572	Sholapurtown	53,403	Dispensary...	283	290	12	399	139
		...	...	...	...	112	113	Pandharpur	16,275	Do.	50	62	...	105	7
		...	...	...	...	26	80	Bársi ...	18,560	Do.	11	15	...	25	1
		...	...	...	...	40	...	Karmálá ...	6,759	Do.	17	23	...	35	3
		...	...	...	...	772	765		94,997		370	391	13	572	151
		...	...	...	...	244	246	Sátára. Karhád ...							
		...	...	...	...	245	101	Wái ...	11,410	Dispensary...	115	129	...	205	39
		...	...	...	...	142	156	Islámpur ...	11,062	Do.	118	127	...	198	31
		...	...	...	...	32	36	Mahablesh-war.	8,390	Do.	76	66	...	135	7
		...	...	...	...	33	21	Pusesáwali...	4,006	Do.	13	19	8	14	10
		...	...	...	...	167	27	Pátan ...	2,456	Do.	15	18	...	32	1
		...	...	...	...	113	...	Mhaswad ...	3,033	Do.	80	87	...	158	9
		...	...	...	...	976	587		6,321	Do.	63	49	...	97	15
		...	...	...	...	169	339	Ratnágiri. Dápuli ...	46,678		480	495	8	839	112
		...	...	...	...	926	228	Vingurlá ...	8,972	Dispensary...	77	92	...	143	26
									14,996	Do.	451	475	73	839	14
		...	...	...	...	1,095	567		23,968		528	567	73	982	40
		...	...	...	...	330	231	Akalkot ...	8,470	Dispensary	164	166	...	232	98
To al...		...	...	...	...	4,272	4,201		265,998		2,110	2,149	100	3,513	561

VACCINATION.

Each Circle of Superintendence in the Bombay Presidency, during the Year 1874-75.

9									10					11		12
Vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Ages.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those Doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	68	141	189	13	7	209	...	...	...	...	..	...	93·5	...	209
..	2	52	46	91	11	5	107	9	...	...	...	...	...	89·2	...	98
...	...	71	87	145	17	3	165	7	...	1	...	1	...	89·5	...	159
...	34	65	113	164	19	6	189	11	...	...	...	...	...	89·6	...	178
...	8	30	105	110	10	15	135	...	...	...	...	...	...	91·6	...	135
...	...	77	48	84	40	5	129	4	...	...	...	...	...	67·7	...	125
...	...	...	6	...	6	...	6	...	...	...	...	...	...	...	...	6
...	...	8	9	13	3	1	17	...	...	...	...	...	...	81·2	...	17
...	44	371	555	796	119	42	957	31	...	1	...	1	...	86·9	...	115
...	...	...	8	8	...	...	8	..	..	...	...	...	...	100	...	8
...	...	47	27	74	...	...	74	...	...	...	...	...	...	100	...	74
...	...	31	59	75	15	...	90	...	...	...	...	...	...	83·3	...	90
...	...	78	94	157	15	...	172	...	...	...	...	...	...	91·2	...	57
...	...	1	9	4	6	...	10	...	2	10	...	12	2	40·0	16·6	20
...	23	312	261	547	37	10	594	21	...	1	...	1	...	93·6	...	574
...	...	79	33	105	1	7	113	1	...	..	...	...	...	99·0	...	112
...	...	18	8	25	...	1	26	.	...	..	...	...	...	10·0	...	26
..	2	16	24	34	3	3	40	...	...	...	...	...	...	91·8	...	40
...	25	426	335	715	47	21	783	22	2	11	...	13	2	93·8	15·3	154
...	...	122	122	232	15	3	250	6	...	...	...	...	..	93·9	...	244
...	16	101	144	241	...	4	245	...	..	...	...	...	...	100	...	245
...	...	86	56	120	18	4	142	...	..	...	...	...	...	86·9	...	142
...	...	19	13	26	6	...	32	...	...	...	...	...	...	81·2	...	32
...	...	16	17	28	5	...	33	...	...	...	...	...	...	84·8	...	33
...	...	86	81	162	3	3	168	1	...	...	...	...	...	98·1	...	167
...	...	45	67	106	5	2	113	1	1	...	...	1	...	95·4	100	113
...	16	475	500	915	52	16	983	8	1	...	...	1	...	94·6	100	139
...	...	89	80	159	13	1	173	4	...	...	...	...	...	92·4	...	169
...	....	409	517	925	1	...	926	...	...	...	...	...	...	99·8	...	926
...	...	498	597	1,084	14	1	1,099	4	...	...	...	...	...	98·7	...	547
...	...	277	53	327	9	3	339	9	...	...	...	...	...	97.3	...	330
...	85	2,125	2,134	3,994	256	83	4,333	74	3	12	...	15	2	93·9	20·0	164

1	2	3		4		5		6	7	8	Primary				
											A.		B.		
											Sex.		Caste		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectora e, political agency, or native state, for thepopulation of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu	Mussalman.
		1874-75.	1873-74.	1874-75.	1873-7.	1874-75.	1873-74.								
Southern Circle.	J. Raby, Surgeon.	...	...	...	...	...	118	Belgaum. Belgaum. ...	...	Jail	...	...	...	...	...
		...	...	...	...	47	122	Athni. ...	11,588	Dispensary	24	23	...	45	2
		...	...	...	...	47	240		11,588		24	23	...	45	2
		...	...	...	...	54	40	Dhárwád. Hubli. ...	37,961	Dispensary	30	24	...	37	17
		...	...	...	...	17	21	Dhárwád. ...	...	Jail	10	3	...	11	2
		...	...	...	...	71	61		37,961		40	27	...	48	19
		...	...	...	...	752	746	Kárwar. ...	13,263	Civil Hospital.	188	170	54	280	22
		...	...	...	...	17	113	Do.	...	Dispensary	8	6	2	12	...
		...	...	...	...	65	16	Kánara. Ilápur. ...	1,431	Do.	41	23	3	45	16
		...	...	...	...	74	60	Mundegod ...	970	Do.	41	33	...	36	38
		...	...	...	...	81	103	Honáwar. ...	5,191	Do.	49	32	12	67	1
		...	...	...	...	99	121	Sirsi. ...	5,285	Do.	63	36	25	59	15
		...	...	...	...	103	21	Halial ...	5,071	Do.	55	48	7	60	36
		...	...	...	...	29	18	Supá. ...	363	Do.	11	18	...	11	18
		...	...	...	...	378	658	Kumptá. ...	10,932	Do.	203	173	55	282	39
		...	...	...	...	57	24	Siddápur. ...	2,157	Do.	28	29	1	48	8
		...	...	...	...	1,055	1,880		44,663		687	568	159	900	193
		...	...	...	...	...	7	Káládgi. Káládgi. ...	...	Dispensary	...	...	...	...	...
		...	...	...	...	8	73	Bágalkot. ...	14,002	Do.	3	5	..	3	5
		...	...	...	...	8	80		14,002		3	5	...	3	5
		...	...	...	...	479	518	Sáwantwádi.	8,017	Dispensary	185	161	48	251	47
		...	...	...	...	849	823	Kolhápur.	39,621	Civil and Police Hospital	236	248	15	357	101
Total ...		...	...	...	...	3,109	3,602		155,852		1,175	1,032	222	1,604	367

9									10					11		12
vaccine operations									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age-		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
...	...	19	28	32	8	7	47	...	...	...	...	...	...	80·0	...	47
...	...	19	28	32	8	7	47	...	...	...	...	...	...	80·0	...	47
...	...	20	34	54	...	...	54	...	...	...	...	...	...	100	...	54
...	...	...	13	11	3	...	14	1	1	4	...	5	1	78·5	20·0	17
...	...	20	47	65	3	...	68	1	1	4	...	5	1	95·5	20·0	35
...	2	119	239	310	56	3	369	11	175	294	21	490	96	84·6	37·3	752
...	...	4	10	12	2	...	14	...	...	3	...	3	...	85·7	...	17
...	...	14	50	61	5	...	66	2	1	...	...	1	...	92·4	100	65
...	...	18	56	57	17	...	74	...	...	...	...	...	...	77·0	...	74
...	1	11	70	74	4	3	81	...	...	...	...	...	...	94·8	...	81
...	...	30	69	92	7	...	99	...	...	...	...	...	...	92·9	...	39
...	...	24	79	103	...	...	103	...	...	...	...	...	...	100	...	103
...	...	1	28	26	3	...	29	...	...	...	...	...	...	89·6	...	29
...	...	156	220	358	21	1	380	4	1	1	...	2	...	94·4	50·0	378
..	...	1	56	57	...	...	57	...	...	...	...	...	...	100	...	57
...	3	378	877	1,150	115	7	1,272	17	177	298	21	496	96	90·9	37·2	165
...	...	...	...	..	...	...	...	...	...	...	...	...	...	...	...	...
...	..	8	...	8	...	...	8	...	...	...	...	...	...	100	...	8
...	...	8	...	8	...	...	8	...	...	...	...	...	...	100	...	8
...	...	212	134	334	27	1	362	16	87	45	1	133	...	92·5	65·9	479
...	11	228	256	452	11	21	484	...	293	35	37	365	...	97·6	89·3	849
...	14	865	1,342	2,041	164	36	2,241	34	558	382	59	999	97	92·5	59·3	194

1	2	3		4		5		6	7	8	A.		B.		
											Sex.		Caste.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.								
Western Circle.	T. Cody, Surgeon.	...	...	...	...	...	20	Thána. Thána Jail...	...	Jail ...	...	...	...	...	...
		...	...	...	...	22	17	Thána. Thána Town.	14,299	Police Corps.	13	9	...	22	...
		...	...	...	...	13	56	Thána. Do.	...	Dispensary...	7	6	...	2	11
		...	...	...	...	94	73	Thána. Bandorá ...	7,227	Do.	48	46	31	46	13
		...	...	...	...	211	161	Thána. Kalián ...	12,804	Do.	105	106	...	158	46
		...	...	...	...	100	142	Thána. Kurlá ...	3,000	Do.	54	46	11	77	12
		...	...	...	...	54	60	Thána. Uran ...	8,690	Do.	31	21	10	36	6
		...	...	...	...	476	37	Thána. Bhiwandi ...	11,907	Do.	230	246	...	260	157
		...	...	...	...	100	197	Thána. Bassein ...	9,713	Do.	56	43	55	42	2
		...	...	...	...	270	73	Thána. Kelvi Máhim	7,183	Do.	138	129	...	267	...
		...	...	...	...	...	10	Thána. Matheran ...	...	Do.	...	...	...	...	...
		...	...	...	...	1,340	846		74,823		682	652	107	910	247
		...	...	...	...	119	209	Kolába. Alibag ...	5,473	Dispensary...	63	55	1	95	9
		...	...	...	...	68	121	Kolába. Pen ...	6,514	Do.	33	35	...	60	2
		...	...	...	...	187	330		11,987		96	90	1	155	11
		...	...	...	...	309	245	Nasik. Ioli ...	17,461	Dispensary...	166	143	...	213	96
		...	...	...	...	163	48	Nasik. Sinnar ...	10,044	Do.	96	67	...	139	22
		...	...	...	...	191	34	Nasik. Dindori ...	2,316	Do.	106	85	...	177	14
		...	...	...	...	663	327		29,821		368	295	...	529	132
		...	...	...	...	207	239	Khandesh. Dharangaon .	11,087	Bhil Corps. Hospital...	94	91	1	137	47
		...	...	...	...	166	297	Khandesh. Irandol ...	11,071	Dispensary...	80	86	...	136	30
		...	...	...	...	276	131	Khandesh. Parolá ...	12,235	Do.	126	150	...	248	28
		...	...	...	...	649	667		34,393		300	327	1	521	105
		...	...	...	...	51	164	Penth	2,004	Dispensary...	30	21	...	50	1
Total...		...	...	...	...	2,890	2,334		153,028		1,476	1,385	109	2,165	496

9									10					11		12
Vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
..	...	6	16	22	...	...	22	...	...	...	...	...	...	100	...	22
...	...	1	12	12	1	...	13	...	...	...	...	...	...	92·3	...	13
2	2	9	85	90	1	3	94	...	...	...	...	...	...	98·9	...	94
6	1	141	70	157	14	41	212	1	...	...	.	...	...	91·8	...	211
...	...	43	57	79	12	9	100	...	...	...	...	...	...	86·8	...	100
...	...	17	35	48	3	1	52	...	...	2	...	2	...	94·1	...	54
1	58	157	319	445	20	11	476	...	..	...	...	...	...	95·6	...	476
...	..	55	44	79	14	11	104	5	...	1	...	1	...	84·9	...	100
...	...	131	136	243	43	...	286	19	1	2	...	3	...	84·9	33·3	270
...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
9	61	560	774	1,175	108	76	1,359	25	1	5	...	6	...	91·5	16·6	148
...	13	57	61	111	7	...	118	...	...	1	...	1	...	94·0	...	119
...	6	43	25	51	13	5	69	1	...	...	...	...	...	79·6	...	68
...	19	100	86	162	20	5	187	1	...	1	...	1	...	89·0	...	93
...	...	129	180	206	76	27	309	...	...	...	...	...	...	73·0	...	309
...	2	69	94	128	25	10	163	...	...	...	...	...	...	83·6	...	163
...	...	101	90	183	1	7	191	..	...	...	...	...	...	99·4	...	191
...	2	299	364	517	102	44	663	...	....	...	...	...	...	83·5	...	221
...	...	70	115	151	41	1	193	8	14	8	...	22	...	78·6	63·6	207
...	..	67	99	166	...	...	166	...	...	...	...	...	...	100	...	166
...	...	98	178	268	3	5	276	...	...	...	...	...	...	98·8	...	276
...	...	235	392	585	44	6	635	8	14	8	...	22	...	93·0	63·6	216
...	...	5	46	47	4	...	51	...	...	...	...	...	...	92·1	...	51
9	82	1,199	1,662	2,486	278	131	2,895	34	15	14	...	29	...	89·9	51·7	160

1	2	3		4		5		6	7	8	Primary				
											A.		B.		
											Sex.		Caste.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.								
Eastern Gujarath Circle.	Mancharji Beramji Cola, M.D.	...	...	...	...	290	281	Kheda. Borsad ...	12,214	Dispensary ..	170	118	5	236	47
		...	...	..	...	168	180	Dákor ...	7,740	Do.	85	83	...	164	4
		...	...	...	...	530	299	Kapatbanj ...	13,982	Do	269	261	...	333	197
		...	...	...	...	307	193	Mahudá ...	9,384	Do.	166	141	...	207	100
		...	...	...	...	302	201	Mahamuda-bad ...	8,065	Do.	161	141	...	266	36
		...	...	...	...	1,597	1,154		51,385		851	744	5	1,206	384
		...	...	...	...	244	360	Broach. Jambusar ...	14,924	Dispensary...	132	111	...	175	68
		...	...	...	...	192	142	Ankleshwar..	9,414	Do.	98	94	...	170	21
		...	...	...	...	108	112	Hansot ...	4,152	Do.	51	57	...	97	10
		...	...	...	...	81	46	Elao ...	1,915	Do.	35	43	...	59	1
		...	...	...	...	625	660		30,405		316	305	...	501	100
		...	...	...	...	315	...	Surat. Surat Jail ...	...	Jail ...	304	11	2	240	62
		...	...	...	...	252	214	Balsad ...	11,313	Dispensary...	144	107	...	168	54
		...	...	...	...	51	58	Kali Wádi ...	1,532	Victoria do.	20	31	...	23	1
		...	...	...	...	165	122	Párdi ...	4,568	Dispensary.	84	81	...	135	20
		...	...	...	...	87	84	Chikli ...	2,500	Do.	49	38	...	77	10
		...	...	...	...	132	133	Bardoli ...	4,089	Do.	71	61	...	106	26
		...	...	...	...	81	169	Mándvi ...	4,256	Do.	46	35	...	78	3
		...	...	...	...	332	207	Randir ...	10,280	Do.	159	173	...	249	83
		...	...	...	...	1,415	987		38,538		877	537	2	1,076	259
		...	...	...	...	500	476	Panch Mahals. Godhrá	10,635	Dispensary...	235	250	...	190	276
		...	...	...	...	92	90	Rewá Kántha. Baria ...	2,891	Dispensary...	44	47	...	67	2
		...	...	...	...	264	117	Mahi Kántha. Sádrá ...	6,749	Mahi Kántha Agency Dispensary.	126	95	...	197	24
Total...		...	...	...	...	4,493	3,484		140,603		2,449	1,978	7	3,237	1,045

9									10					11		12
Vaccine operations									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	...	239	49	267	15	8	290	2	1	...	1	2	...	94·6	100	290
...	...	111	57	156	14	1	171	3	...	...	...	...	...	91·7	...	168
...	...	427	103	523	3	4	530	...	...	...	...	...	...	99·4	...	530
...	...	232	75	297	2	8	307	...	...	...	...	...	...	99·3	...	307
...	...	247	55	284	5	17	306	4	...	...	...	...	...	98·2	...	302
...	...	1,256	339	1,527	39	38	1,604	9	1	...	1	2	...	97·5	100	319
...	...	176	67	202	5	36	243	...	...	...	1	1	...	97·5	...	244
1	...	127	65	184	1	7	192	...	...	...	...	...	...	99·4	...	192
1	...	95	13	102	2	4	108	...	...	...	...	...	...	98·0	...	108
18	...	57	21	72	5	3	80	2	3	...	...	3	...	93·5	100	81
20	....	455	166	560	13	50	623	2	3	...	1	4	...	97·7	100	156
11	...	...	315	210	105	...	315	...	...	...	...	...	...	66·6	...	315
29	...	149	102	226	10	15	251	...	...	1	...	1	...	95·7	...	252
27	.	20	31	50	...	1	51	...	...	...	...	...	...	100	...	51
10	...	96	69	159	7	...	166	1	...	...	...	...	...	95·7	...	165
...	..	60	27	86	2	...	88	1	...	...	...	...	...	97·7	...	87
...	...	95	37	127	7	...	134	2	...	...	...	...	...	94·7	...	132
...	...	46	35	60	6	15	81	...	...	...	...	...	...	90·9	...	81
...	...	203	129	324	8	...	332	...	...	...	...	...	...	97·5	...	332
77	...	669	745	1,242	145	31	1,418	4	...	1	...	1	...	89·5	...	176
...	19	401	84	473	11	1	485	...	13	1	1	15	...	97·7	92·8	500
...	22	33	58	85	5	1	91	...	1	...	...	1	...	94·4	100	92
...	...	160	61	201	21	...	222	1	25	16	2	43	...	90·5	60·9	264
97	41	2,974	1,453	4,088	234	121	4,443	16	43	18	5	66	...	94·5	70·4	224

1	2	3		4		5		6	7	8	Primary:				
											A.		B		
											Sex.		Caste.		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.								
Western Gujarath Circle.	E. R. Butler, M.D., Surgeon-Major; Offg. A. M. Blomfield, Surgeon-Major.	...	...	...	...	122	126	Ahmadábád. Veramgáon	19,661	Dispensary...	58	64	...	64	58
		...	...	...	...	147	256	Sánand ...	7,229	Do.	75	72	...	139	8
		...	...	...	...	246	326	Prántej ...	8,341	Do.	147	97	...	205	39
		...	...	...	...	191	165	Dholká ...	20,854	Do.	96	95	...	131	60
		...	...	...	...	200	342	Dholerá ...	12,468	Do.	122	74	...	172	24
		...	...	...	...	205	256	Gogo ...	9,571	Do.	113	92	3	113	89
		...	...	...	...	1,111	1,471		78,124		611	494	3	824	278
		...	...	...	...	64	...	Kathewád. Rajkot Jail...	...	Jail ...	...	...	...	...	...
		...	...	...	...	44	64	British Station of Wadwán ...	1,059	Wadwán Dispensary ...	23	21	...	43	1
		...	...	...	...	5	...	Do. Mánikwáda.	1,000	Mánikwádá Dispensary.	2	3	...	4	1
		...	...	...	...	21	6	Do. Songad.	890	Songad or Sonpuri Dispensary.	11	10	...	16	3
		...	...	...	...	134	70		2,949		36	34	...	63	5
		...	...	...	...	553	602	Kathewád. States. Gondal ...	13,180	Dispensary...	285	252	1	412	124
		...	...	...	...	605	357	Dhoráji ...	15,562	Do.	317	288	...	211	394
		...	...	...	...	401	...	Bháyawadar.	5,563	Do.	208	184	...	341	51
		...	...	...	...	171	78	Upletá ...	6,500	Do.	89	82	...	130	41
		...	...	...	...	57	...	Sarsai ...	1,453	Do.	24	33	...	51	6
		...	...	...	...	1,787	1,037		42,258		923	839	1	1,145	616
Total...		...	...	...	...	3,033	2,578		123,331		1,570	1,367	4	2,032	899

9									10					11		12
Vaccine operations.									Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
		C.		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator
...	...	116	6	117	5	...	122	...	..	...	...	...	...	95·9	...	122
...	...	118	29	122	17	8	147	...	...	...	...	...	...	87·7	...	147
...	...	196	48	234	8	2	244	...	2	...	...	2	...	93·6	100	246
...	...	153	38	175	6	10	191	...	...	...	...	...	...	96·6	...	191
...	...	93	103	134	41	21	196	...	...	4	...	4	...	76·5	...	200
...	...	108	97	179	21	5	205	...	...	...	...	...	...	89·5	...	205
...	...	784	321	961	98	46	1,105	...	2	4	...	6	...	90·7	33·3	185
...	...	...	...	...	...	...	...	...	46	15	3	64	...	...	75·4	64
...	...	18	26	39	1	4	44	...	...	...	...	...	...	97·5	...	44
...	...	3	2	3	2	...	5	...	...	...	...	...	...	60·0	...	5
2	...	4	17	19	...	2	21	..	...	...	...	...	...	100	...	21
2	...	25	45	61	3	6	70	...	46	15	3	64	...	95·3	75·4	33
...	...	271	266	475	59	5	539	2	16	...	...	16	...	88·9	100	553
...	...	215	390	547	51	8	606	1	...	...	...	...	...	91·4	...	605
..	...	234	158	388	4	4	396	4	9	...	...	9	...	98·9	100	401
...	...	71	100	118	42	14	174	3	...	...	...	...	...	73·7	...	171
...	...	18	39	35	22	...	57	...	...	...	...	...	...	61·4	...	57
..	...	809	953	1,563	178	31	1,772	10	25	...	...	25	...	89·7	100	357
2	...	1,618	1,319	2,585	279	83	2,947	10	73	19	3	95	...	90·2	79·3	220

1	2	3		4		5		6	7	8	Primary				
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	A.		B.		
											Sex.		Caste.		
		1874-75	1873-74	1874-75	1873-74	1874-75.	1873-74.				Males.	Females.	Christian.	Hindu.	Musalman.
Sindh Circle.	J. Williams, M.D., Surgeon.														
		...	...	...	...	6	22	Karáchi ...	53,526	Dispensary...	5	1	...	3	3
		...	...	...	...	88	11	Manorá ...	809	Do.	16	9	6	2	17
		...	...	...	...	66	228	Keti Bandar.	2,199	Do.	33	32	...	31	34
		...	...	...	...	356	106	Mirpur ..	2,846	Do.	134	124	...	75	154
		...	...	...	...	232	342	Tátá ...	7,951	Do.	115	91	...	130	76
		...	...	...	...	90	177	Jarrak ...	1,666	Do.	49	30	...	43	36
		...	...	...	...	39	51	Bulá Khan's Tándá ...	1,244	Do.	13	17	...	12	18
		...	...	...	...	117	81	Sehwan ...	4,294	Do.	69	48	...	33	84
		...	...	...	...	994	1,018	Karáchi.	74,535		434	352	6	329	422
		...	...	...	...	175	323	Mehar ...	1,246	Dispensary...	109	66	...	83	92
		...	...	...	...	260	531	Lárkháná .	10,643	Do.	131	129	1	71	188
		...	...	...	...	...	303	Rohri ...	8,580	Do.	...	...	...	...	...
		...	...	...	...	435	1,157	Shikárpur.	20,469		240	195	1	154	280
		...	...	...	...	106	154	Tharoshá ...	2,219	Dispensary...	54	43	...	69	28
		...	...	...	...	101	200	Hálá ...	4,104	Do.	64	37	...	54	47
		...	...	...	...	235	421	Aliyár-ká-Tándá. ...	3,923	Do.	124	103	...	159	68
		..	...	..	...	208	129	Mahammad Khán's Tándá.	3,672	Do.	99	108	..	114	93
		...	...	...	...	650	904	Haidrábad.	13,918		341	291	...	396	236
		...	...	...	...	209	105	Nagar Párkar ...	2,425	Dispensary...	40	44	...	71	13
		...	...	...	...	279	177	Mitti ..	2,580	Do.	75	73	...	111	18
		..	..	...	...	416	224	Umarkot...	3,999	Do.	178	90	...	227	41
		...	...	...	...	157	95	Kiprá ...	1,460	Do.	48	49	...	87	10
		...	...	...	..	1,061	601	Thar and parkar.	10,464		341	256	....	496	82

9								10					11		12
Vaccine operations.								Re-vaccinations.					Percentage of successful cases excluding those unknown from the total.		
		C		D.			E.	F.	A.	B.	C.	D.	E.			
		Age.		Result.											
Parsi	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations	Average number of persons vaccinated by each vaccinator.
...	...	4	2	3	...	3	6	...	...	...	...	...	...	100	...	6
...	...	13	12	25	..	...	25	...	...	42	21	63	...	100	...	88
...	...	34	31	37	20	18	75	10	...	1	...	1	...	64·9	...	66
...	29	108	150	237	9	12	258	...	52	27	19	98	...	96·3	65·8	356
...	...	79	127	171	20	19	210	4	5	21	...	26	...	84·2	19·2	232
...	...	64	15	63	15	1	79	...	10	1	...	11	..	80·7	90·9	90
...	...	21	9	29	4	...	33	3	6	3	...	9	...	87·8	66·6	39
...	...	45	72	90	15	12	117	...	...	...	...	...	...	85·7	...	117
...	29	368	418	655	83	65	803	17	73	95	40	208	...	88·7	43·4	124
...	...	94	81	173	2	...	175	...	...	...	...	...	...	98·8	...	175
...	...	190	70	167	4	89	260	...	...	...	...	...	...	97·6	...	260
...	...	...	...	...	..	...	...	...	...	...	...	...	...	...	...	..
...	..	284	151	340	6	89	435	...	...	...	...	...	...	98·2	...	217
...	...	72	25	86	4	7	97	...	9	...	...	9	...	95·5	100	106
...	...	80	21	91	3	7	101	...	...	...	...	...	..	96·8	..	101
..	...	104	123	223	2	4	229	2	7	...	1	8	...	99·1	100	235
...	...	122	85	183	3	21	207	...	1	...	...	1	...	98·3	100	208
...	...	378	254	583	12	39	634	2	17	...	1	18	...	97·9	100	162
..	...	57	27	82	...	2	84	...	35	46	44	125	...	100	43·2	209
...	19	69	79	148	...	...	148	...	92	29	10	131	...	100	76·0	279
...	...	99	169	200	50	18	268	...	32	99	17	148	...	80·0	24·4	416
...	...	50	47	95	2	..	97	...	60	...	...	60	...	97·9	100	157
	19	275	322	525	52	20	597	...	219	174	71	464	...	90·9	55·7	265

1	2	3		4		5		6	7	8	Primary Vaccinations				
											A.		B		
											Sex.		Caste		
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state, for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Children.	Hindu.	Musalman.
		1874-75.	1873-74.	1874-75.	1873-74.	1874-75.	1873-74.								
Sindh Circle—*concluded.*	J. Williams, M. D. Surgeon.	...	...	...	...	112	110	Mekran Coast. } Goádar ...	6,000	Dispensary.	85	27	...	...	112
Total ...		...	...	...	...	3,252	3,790		125,386	.....	1,441	1,121	7	1,375	1,132
		...	...	...	...	144	...	Muscat.		Dispensary.	72	68	...	...	140
Grand Total.		...	...	..	...	21,192	19,989		964,198		10,293	9,100	449	13,926	4,640

Details of Column 5.

Total number of persons vaccinated.....	21,192
Deduct persons re-vaccinated	1,799
Number of persons primarily vaccinated...	19,393

Details of Primary Vaccinations.

Total number of operations (Col. 9 E) ...	
Deduct persons vaccinated	
Number of operatios in excess of persons...	

9									10					11		12
Vaccine Operations.									Re-vaccinations.					Percentage of successful cases excluding those unknown from the total.		
		C.		D.			E.	F	A.	B.	C.	D.	E.			
		Age.		Result.												
Parsi.	Other castes.	Under one year.	Above one year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
...	...	48	64	71	34	7	112	...	...	...	...	...	...	67·6	...	112
...	48	1,353	1,209	2,174	187	220	2,581	19	309	269	112	690	...	92·0	53·4	171
...	...	11	129	95	12	33	140	...	3	...	1	4	...	88·4	100	144
108	270	10,145	9,248	17,463	1,410	707	19,580	187	1,004	714	180	1,898	99	92·5	58·4	184

.....	19,580
.....	19,393
.....	187

Details of Re-vaccinations.

Total number of operations (Col. 10 D)	1,898
Deduct persons re-vaccinated	1,799
Number of operations in excess of persons	99

C.—VACCINATION DEPARTMENT.

STATEMENT No. VI., showing particulars of Vaccination in the Bombay Army 1874-75.

European Army.	Number successfully vaccinated.								
	Europeans.				Natives.				Total.
	Males.	Females.	Children.	Total.	Males.	Females.	Children.	Total.	
Regiments	175	7	358	540	5	2	3	10	550
Lines	...	...	...	...	2	4	109	115	115
Bazárs	...	...	4	4	2	2	55	59	63
Total	175	7	362	4 54	9	8	167	184	728

Strength of Europeans	Men		10,866
	Women		1,210
	Children		2,453
		Total	14,529

Native Army.	Number of Vaccinators.		Total number of persons vaccinated and re-vaccinated.		Strength.			Primary Vaccinations.												Re-vaccinations.				Percentage of successful cases, excluding those unknown from the total.	
								Sex.		Caste.					Age.		Result.				Result.					
	1		2		3			4		5					6		7			8	9			10	11	
	1874-75.	1873-74.	1874-75.	1873-74.	Europeans.	Natives.	Total.	Males.	Females.	Christian.	Hindu.	Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	In primary vaccination.	In re-vaccination.
Regiments.	..	..	3,603	4,702	559	42,833	43,392	1,248	972	75	1,643	413	5	84	1,732	488	2,125	194	20	2,336	619	804	22	1,445	91·7	43·4
* Camp Followers.	4	4	2,949	3,530	17,793	39,386	57,179	1,558	1,344	164	1,951	668	32	87	2,570	332	2,721	258	44	3,023	38	10	1	49	91·3	79·1
Total ..	4	4	6,552	8,232	18,352	82,219	100,571	2,806	2,316	239	3,594	1,081	37	171	4,302	820	4,846	449	64	5,359	657	814	23	1,494	91·5	44·6

* Regimental Lines or Bazar and Cantonment Bazar.

Details of Column 2.

Total number of persons vaccinated.....6,552
Deduct persons re-vaccinated 1,430

Number of persons primarily vaccinated..5,122

Details of Primary Vaccinations.

Total number of operations (Column 8).....5,359
Deduct persons vaccinated 5,122

Number of operations in excess of persons.....237

Details of Re-vaccinations.

Total number of operations (Column 10).....1,494
Deduct persons re-vaccinated 1,430

Number of operations in excess of persons.....64

Return of Small-pox in European Army for 1874.

		Remained.	Admitted.	Total.	Recovered.	Died.	Remaining.	Total.	Previously vaccinated.
Regiments	Males	...	4	4	4	...	...	4	4
	Females	...	...	...	...	...	...	...	...
	Children	...	7	7	6	1	...	7	...
	Total	...	11	11	10	1	..	11	4

Return of Small-pox in Native Army for 1874-75.

		Remained.	Admitted.	Total.	Recovered.	Died.	Remaining.	Total.	Previously vaccinated.
Regiments	Males	5	12	17	10	1	6	17	15
	Females	...	5	5	5	...	...	5	5
	Children	1	12	13	11	1	1	13	11
Regimental Lines or Bazars	Males	...	3	3	3	...	...	3	3
	Females	...	...	...	...	...	...	...	...
	Children	2	3	5	4	1	...	5	2
	Total	8	35	43	33	3	7	43	36

D.

SUMMARY OF THE DIARIES OF INSPECTING OFFICERS

AND

DEATHS FROM SMALL-POX.

D.—VACCINE DEPARTMENT.

STATEMENT No. VII.

SUMMARY of the Diaries of Superintendents of Vaccination and their Assistants for the Year 1874-75.

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1874-75.	Deaths from small-pox in 1874.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total	Superintendent.	Assistant superintendent.	Total.		
Presidency.	1	...	1	City of Bombay ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	14,707	258
Surgeon-Major.		Trimbak Anánt.	Púná.	Haweli	2	18	20	3	59	62	132	407	539	1	49	50	5	2,212	2,217	5,803	110
				Máwal	...	27	27	...	32	32	...	374	374	...	112	112	...	1,727	1,727	1,637	6
				Khed	...	8	8	...	20	20	...	209	209	...	56	56	...	902	902	2,278	...
				Juner	...	11	11	...	28	28	...	284	284	...	31	31	...	1,366	1,366	1,945	8
				Purandhar	...	9	9	...	19	19	...	206	206	...	42	42	...	1,038	1,038	2,411	3
				Sirúr	...	19	19	...	33	33	...	383	383	...	53	53	...	1,448	1,448	1,821	1
				Indápur	4	14	18	9	40	49	108½	444	552½	27	68	95	1,088	1,270	2,358	1,726	...
				Bhimthadi	3	21	24	4	41	45	44½	483	527½	9	52	61	452	1,175	1,627	1,782	1
		1	1		9	127	136	16	272	288	285	2,790	3,075	37	463	500	1,545	11,138	12,683	19,403	129
		Rámji Khandéráo.	Ahmadnagar.	Nagar	...	14	14	...	82	82	...	782	782	...	58	58	...	2,090	2,090	3,355	3
				Ráhuri ...	...	15	15	...	16	16	...	146	146	...	39	39	...	1,106	1,106	2,519	2
				Párner	...	16	16	...	20	20	...	198	198	...	40	40	...	929	929	2,015	1
				Shrígundí	...	24	24	...	38	38	...	348	348	...	46	46	...	1,113	1,113	1,875	5
				Karjat	...	7	7	...	15	15	...	156	156	...	21	21	...	772	772	1,942	1
				Newásá	...	14	14	...	18	18	...	109	109	...	36	36	...	953	953	1,733	2
				Ankolá	...	9	9	...	13	13	...	127	127	...	50	50	...	1,204	1,204	2,023	2
				Jámkhed	...	16	16	...	20	20	...	143	143	...	35	35	...	1,045	1,045	2,072	3
				Kopargáon	...	7	7	...	16	16	...	140	140	...	36	36	...	1,000	1,000	1,465	...
				Sangamner	...	15	15	...	17	17	...	110	110	...	48	48	...	1,006	1,006	2,386	2
				Siogáon	...	5	5	...	12	12	...	137	137	...	40	40	...	933	933	3,001	1
	1	1			...	142	142	...	267	267	...	2,396	2,396	...	449	449	...	12,151	12,151	24,386	22

Central.	J. Pinkerton, M.D.,	Bálájí Ganesh Keshew Sidheshwar, Acting.	Sholápur.	Native State.	Sholápur	4	41	45	8	54	62	61	454	515	14	42	56	521	2,561	3,082	4,537	12
					Mádhé	2	28	30	5	29	34	71	226	297	14	27	41	451	1,109	1,560	2,216	4
					Karmálá	5	26	31	5	30	35	50	243	293	16	35	51	1,038	1,209	2,247	2,093	3
					Pandharpur	2	41	43	5	41	46	315	304	619	8	42	50	893	2,000	2,893	3,472	7
					Sangolá	1	14	15	1	19	20	19	128	147	1	21	22	218	1,433	1,651	1,800	...
					Barsi	3	26	29	3	35	38	31	186	217	7	39	46	327	1,641	1,968	3,353	3
					Akalkot ...	2	18	20	3	18	21	29	146	175	3	21	24	336	650	986	2,135	...
		1	1			19	194	213	30	226	256	576	1,687	2,263	63	227	290	3,784	10,603	14,387	19,656	29
		Bálkrishna Rájárám.	Sátárá.	Native State.	Sátárá	1	31	32	3	93	96	16	799	815	4	114	118	159	2,318	2,477	3,568	1
					Mahábleshwar ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	32	...
					Jáwalí	...	12	12	...	19	19	...	226	226	...	78	78	...	1,414	1,414	2,966	3
					Wai	...	30	30	...	38	38	...	368	368	...	98	98	...	2,428	2,428	2,390	7
					Khatáw	2	15	17	3	22	25	24	203	227	6	34	40	381	978	1,359	2,236	11
					Mán	3	15	18	3	24	27	29½	311	340½	6	39	45	255	958	1,213	1,688	...
					Malsiras	...	16	16	...	19	19	...	191	191	3	54	57	185	1,537	1,722	2,699	2
					Koregáon	1	29	30	4	53	57	29	313	342	3	64	67	275	2,028	2,303	2,453	...
					Bhor	...	11	11	...	13	13	...	150	150	...	37	37	...	483	483	1,945	...
					Phaltan ...	...	18	18	...	26	26	...	246	246	...	63	63	...	1,180	1,180	1,229	...
						7	177	184	13	307	320	98½	2,807	2,905½	22	581	603	1,255	13,324	14,579	21,206	24
		Vináyak Bápuji.			Tásgáon	...	21	21	...	23	23	...	208	208	...	44	44	...	1,572	1,572	1,914	...
					Wálwá	...	22	22	...	28	28	...	218	218	...	52	52	..	2,601	2,601	3,098	21
					Karhád	2	22	24	2	57	59	20	409	429	3	66	69	206	2,171	2,377	2,837	3
					Khánápur	...	47	47	...	52	52	...	360	360	...	84	84	...	1,557	1,557	1,870	3
					Pátan...	3	47	50	5	61	66	34	461	495	7	131	138	432	5,688	6,120	3,655	20
					Jat	4	30	34	4	31	35	39	306	345	6	55	61	146	996	1,142	1,554	...
					Atpadi ...	...	20	20	...	25	25	...	284	284	...	35	35	...	1,149	1,149	1,615	...
		2	1			9	209	218	11	277	288	93	2,246	2,339	16	467	483	784	15,734	16,518	16,543	47
		2	1			16	386	402	24	584	608	191½	5,053	5,244½	38	1,048	1,086	2,039	29,058	31,097	37,749	71
		Bálaji Krishnáji.	Ratnágiri.		Ratnágiri	...	34	34	...	40	40	...	398	398	...	37	37	...	1,080	1,080	2,568	70
					Chiplun	2	42	44	4	49	53	31	291	322	8	57	65	415	1,525	1,940	6,085	73
					Khed	4	40	44	5	45	50	43	309	352	10	42	52	359	1,514	1,873	2,574	...
					Dápuli	...	33	33	...	39	39	...	338	338	...	37	37	...	753	753	2,829	58
					Deogarh	...	11	11	...	13	13	...	113	113	...	20	20	...	824	824	2,952	14
					Málwan	...	3	3	...	6	6	...	50	50	...	4	4	...	33	33	5,639	84
					Rájápur	...	30	30	...	32	32	...	237	237	...	50	50	...	1,647	1,647	4,649	8
					Sangameshwar ...	...	2	2	...	2	2	...	34	34	...	...	...	...	...	...	2,457	14
		1	1			6	195	201	9	226	235	74	1,770	1,844	18	247	265	774	7,376	8,150	29,153	321
Total	1	6	5			50	1,044	1,094	79	1,575	1,654	1,126⅓	13,696	14822⅓	156	2,434	2,590	8,142	70,326	78,468	130,347	572

ERN.	Circle.	Name of Surgeon.	Collectorate.	Name of Talúka.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year * 1874-75.	Deaths from small-pox in 1874.
					Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
	1	Dhanjibhái Naddi	1	Belgáum ...	5	30	35	11	65	76	105	549	654	13	67	80	452	2,392	2,844	3,166	249
				Sampgáon ...	1	13	14	1	15	16	9	120	129	3	25	28	361	963	1,324	2,424	21
				Parasgarh ...	4	18	22	6	20	26	49	227	276	15	29	44	884	1,262	2,146	1,790	48
				Gokák ...	3	15	18	4	28	32	47	299	346	5	45	50	842	1,511	2,353	2,172	42
				Chikodi ...	6	26	32	10	47	57	134	576	710	25	85	110	1,052	1,792	2,844	3,446	138
				Bidi ...	3	11	14	3	14	17	33	73	106		24	27	149	906	1,055	2,151	21
				Athni ...	6	24	30	9	27	36	87	311	398	9	36	45	391	460	851	1,060	18
				Southern Maráthá States. Torgal	...	8	8	...	9	9	...	136	136	6	23	29	73	429	502	786	...
				Southern Maráthá States. Ramdurg	1	1	2	2	1	3	30	16	46	9	1	10	301	16	317	420	...
	1		1	Belgáum.	29	146	175	46	226	272	494	2,307	2,801	88	335	423	4,505	9,731	14,236	17,415	537
		Dhanjibhái Naddi		Dhárwád ...	...	11	11	...	18	18	...	217	217	...	56	56	...	1,165	1,165	3,385	28
				Navalgund ...	5	17	22	7	14	21	75	245	320	14	54	68	215	1,092	1,307	1,724	35
				Bankapur ...	...	8	8	...	9	9	...	82	82	...	27	27	...	508	508	2,034	88
				Hangal ...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	2,408	21
				Hubli ...	...	5	5	...	2	2	...	43	43	...	2	2	...	45	45	3,345	31
				Ranibadnur ...	...	7	7	...	9	9	...	90	90	...	20	20	...	349	349	728	23
				Kod ...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	962	31
				Karajgi ...	...	20	20	...	15	15	...	197	197	...	48	48	...	1,252	1,252	2,860	72
				Kalghatgi ...	...	16	16	...	16	16	...	187	187	...	40	40	...	1,115	1,115	1,624	8
				Ron	...	16	16	...	17	17	...	212	212	...	42	42	...	555	555	955	41
				Gadak ...	...	23	23	...	35	35	...	414	414	...	70	70	...	1,455	1,455	1,965	107
				Southern Maráthá States. Shirhatti	...	14	14	...	14	14	...	146	146	...	44	44	...	645	645	747	...
				Southern Maráthá States. Lakshmeshwar.	...	6	6	...	12	12	...	114	114	...	30	30	...	565	565	502	...
				Southern Maráthá States. Miraj, 2nd	...	8	8	...	10	10	...	114	114	...	14	14	...	441	441	505	...
				Southern Maráthá States. Kundegal	...	3	3	...	3	3	...	42	42	...	13	13	...	218	218	565	...
				Southern Maráthá States. Savanur	...	4	4	...	5	5	...	71	71	...	7	7	...	178	178	570	...
	1		1	Dhárwad.	5	158	163	7	179	186	75	2,174	2,249	14	467	481	215	9,583	9,798	24,879	485
		Swámiráo Rango.		Kárwár ...	2	13	15	2	43	45	23	315	338	1	42	43	17	968	985	2,409	29
				Kumptá ...	...	13	13	...	37	37	...	380	380	...	39	39	...	1,351	1,351	3,065	56
				Honawar ...	...	12	12	...	34	34	...	405	405	...	42	42	...	1,413	1,413	2,537	73
				Sirsi ...	...	27	27	...	62	62	...	725	725	...	83	83	...	1,388	1,388	1,688	54
				Ilápur ...	...	37	37	...	68	68	...	821	821	...	106	106	...	1,585	1,585	1,349	13
				Siddápur ...	...	12	12	...	19	19	...	235	235	...	25	25	...	893	893	2,188	6
				Paliál ...	...	26	34	16	47	63	174	462	636	30	76	106	1,097	1,612	2,709	4,492	53
	1		1	Kánadá.	10	140	150	18	310	328	197	3,343	3,540	31	413	445	1,114	9,210	10,324	17,778	284

Dattu Bálappá.	Káladgi.	Bágalkot	4	18	22	4	32	36	47	217	264	11	57	68	640	2,131	2,771	3,512	36
		Hunugunda	3	16	19	4	20	24	61	108	169	11	45	56	503	1,089	1,592	2,039	40
		Bágewádi	2	7	9	2	9	11	23	95	118	4	6	10	20	40	60	1,551	52
		Badámi	5	15	20	6	21	27	41	179	220	18	27	45	855	689	1,544	2,618	77
		Mudebihal	2	10	12	5	14	19	46	139	185	7	22	29	322	387	709	2,057	24
		Indi	...	28	28	...	35	35	...	321	321	...	47	47	...	1,608	1,608	2,057	3
		Sindghí	1	23	24	2	32	34	20	267	287	4	67	71	126	1,987	2,113	1,856	50
		Bijápur	4	34	38	6	51	57	69	539	608	22	55	77	805	2,126	2,931	2,996	4
		Southern Maráthá States. Mangalvedá.	3	17	20	4	29	33	83	354	437	1	38	39	30	1,011	1,041	1,229	...
		Southern Maráthá States. Mudhol ...	1	...	1	1	...	1	12	...	12	2	...	2	451	.....	451	1,522	...
		Southern Maráthá States. Jámkhandi...	2	10	12	3	13	16	28	83	111	5	19	24	195	688	883	1,517	...
		Southern Maráthá States. Kurandwad, 2nd ...	...	4	4	...	9	9	...	68	68	...	14	14	...	525	525	717	...
1	1		27	182	209	37	265	302	430	2,370	2,800	85	397	482	3,947	12,281	16,228	24,071	286
Rámachandra Bálájí.	Kolhápur.	Vishálgarh	...	15	15	...	28	28	...	190	190	5	61	66	298	1,470	1,768	1,867	...
		Ichalkaranji	2	15	17	2	25	27	25	201	226	4	36	40	463	1,159	1,622	1,322	...
		Kágal	1	11	12	1	13	14	12	74	86	1	22	23	271	620	891	1,364	...
		Gadhinglaj	...	9	9	...	19	19	...	192	192	4	30	34	97	714	811	1,809	...
		Báura	...	18	18	...	23	23	...	237	237	...	40	40	...	1,573	1,573	1,791	...
		Panálá	1	10	11	6	16	22	40	67	107	12	27	39	434	908	1,342	2,149	...
		Buthargarh	...	6	6	...	16	16	...	79	79	...	24	24	...	651	651	1,076	...
		Shirol	1	16	17	1	19	20	8	122	130	5	33	38	456	1,062	1,518	1,837	...
		Ajrá	...	10	10	...	10	10	...	43	43	...	16	16	...	404	404	1,067	...
		Kholápur	2	23	25	4	36	40	38	283	321	7	62	69	922	1,998	2,920	2,868	...
		Southern Maráthá States. Miraj, 1st ...	2	3	5	4	2	6	27	20	47	1	3	4	456	202	658	687	...
		Southern Maráthá States. Kurandwad, 1st ...	...	6	6	...	10	10	...	53	53	1	7	8	189	260	449	1,106	...
		Southern Maráthá States. Shahapur ...	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	380	...
		Southern Maráthá States. Sangli ...	1	6	7	1	9	10	7	100	107	2	12	14	367	484	851	1,113	...
1	1		10	148	158	19	226	245	157	1,661	1,818	42	373	415	3,953	11,505	15,458	20,436	...
...	...	Sawantwadi	...	9	9	...	10	10	...	137	137	...	12	12	...	820	820	8,022	...
Total... 5	5		81	783	864	127	1,216	1,343	1,353	11,992	13,345	260	1,997	2,257	13,734	53,130	66,864	112,551	1,592
Báláji Ráyáji.	Thánd.	Salsette	2	17	19	2	38	40	136	329	465	1	42	43	3	618	621	1,583	9
		Bassein	3	9	12	6	12	18	84	177	261	13	11	24	199	120	319	1,345	3
		Bhiwandi	2	7	9	4	10	14	50	61	111	14	14	28	294	235	529	2,060	22
		Kalian	2	7	9	5	15	20	60	186	246	13	18	31	281	264	545	2,005	27
		Dahánu	5	4	9	6	11	17	70	136	206	11	8	19	341	245	586	1,720	...
		Karjat	6	28	34	6	41	47	56	318	374	11	69	80	194	741	935	1,393	59
		Máhim	...	71	71	...	123	123	...	1,122	1,122	...	130	130	...	1,449	1,449	1,300	1
		Murbád	...	8	8	...	15	15	...	156	156	...	24	24	...	327	327	1,326	21
		Panwel*	1	39	40	4	71	75	37	619	656	10	132	142	264	946	1,210	2,687	41
		Sháhpur	3	27	30	3	43	46	36	298	334	3	49	52	128	881	1,009	4,063	44
		Wádá...	2	7	9	4	14	18	35	149	184	6	16	22	58	105	163	470	31
		Native State. Jawár	5	11	16	5	16	21	49	166	215	4	27	31	189	782	971	1,903	...
1	1		31	235	266	45	409	454	613	3,717	4,330	86	540	626	1,951	6,713	8,664	21,855	258

* The Assistant Superintendent's inspections in Panwel were done by Mr. Mahadeo Vinayak of Kolaba Zilha.

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1874-75.	Deaths from small-pox in 1874.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
WESTERN.	T. CODY, Surgeon.	Máhádeo Vináyak.*	Kolábá. Native State.	Alibág	1	38	39	1	72	73	16	491	507	6	109	115	136	1,090	1,226	1,699	41
				Mángáon ..	2	21	23	3	28	31	26	283	309	20	76	96	356	527	883	1,661	45
				Máhád ...	4	54	58	6	73	79	100	547	647	9	142	151	439	2,073	2,512	2,393	24
				Pen	3	15	18	4	21	25	55	163	218	22	38	60	335	244	579	1,135	20
				Nagotná Pethá	1	6	7	2	10	12	25	93	118	8	29	37	138	253	391	641	4
				Rohá	1	21	22	2	35	37	20	274	294	7	55	62	149	465	614	1,116	16
				Janjirá	1	3	4	4	5	9	109	39	148	6	7	13	222	19	241	4,310	...
	1	1			13	158	171	22	244	266	351	1,890	2,241	78	456	534	1,775	4,671	6,446	12,955	150
		Kisansing Dowlatsing.	Nasik.	Nasik...	3	10	13	3	50	53	183	323	506	1	59	60	66	1,045	1,111	2,205	2
				Igatpuri	1	8	9	...	11	11	...	157	157	...	51	51	...	736	736	1,643	2
				Niphád	3	17	20	6	23	29	81	197	278	21	40	61	364	602	966	1,392	1
				Chandur	1	27	28	5	29	34	61	290	351	21	49	70	450	925	1,375	1,642	2
				Sinnar	...	14	14	...	14	14	...	131	131	...	40	40	...	593	593	2,129	18
				Málegám	3	18	21	7	33	40	72	616	688	19	58	77	525	1,259	1,784	2,020	13
				Baglan	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,797	...
				Kulwan	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	324	1
				Nándgáon	1	13	14	2	14	16	78	207	285	2	45	47	27	663	690	1,378	2
				Sáwargáon	...	16	16	...	22	22	...	211	211	...	43	43	...	482	482	1,578	3
				Dindori	1	15	16	3	31	34	32	354	386	15	57	72	429	721	1,150	1,990	3
				Penth	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,412	1
	1	1			13	138	151	26	227	253	507	2,486	2,993	79	442	521	1,861	7,026	8,887	19,510	48
		Bálkrishna Gopál.	Khándesh.	Dhuliá	5	43	48	8	75	83	97	926	1,023	25	135	160	807	2,098	2,905	2,604	...
				Shirpur	...	6	6	...	20	20	...	184	184	...	36	36	...	551	551	959	1
				Sháháde	...	7	7	...	17	17	...	237	237	...	66	66	...	1,365	1,365	2,461	47
				Talodé	...	4	4	...	11	11	...	120	120	...	32	32	...	591	591	895	6
				Nandurbár	...	6	6	...	14	14	...	159	159	...	45	45	...	784	784	1,233	32
				Chalisgáon	2	26	28	7	46	53	237	440	677	16	77	93	426	1,358	1,784	1,899	...
				Pimpalner	...	16	16	...	16	16	...	229	229	...	40	40	...	919	919	2,186	2
				Virdal	2	11	13	3	20	23	47	276	323	24	24	48	775	927	1,702	2,216	3
					9	119	128	18	219	237	381	2,571	2,952	65	455	520	2,008	8,593	10,601	14,453	91

* Has also charge of Panwel in Thána Zilha.

	MANCHARJI BERAMJI COLA, M.D.	Dharmá Bápu.	Khandesh.	Sáwadá	...	15	15	...	35	35	...	248	248	...	71	71	....	1,578	1,578	1,907	3
				Nasirábád	2	26	28	5	46	51	63	357	420	9	51	60	433	1,061	1,494	2,044	7
				Irandol	4	19	23	7	28	35	76	317	393	32	78	110	873	1,657	2,530	2,918	2
				Jamner	...	20	20	...	42	42	...	303	303	...	64	64	...	1,145	1,145	1,633	2
				Pachora	1	23	24	1	56	57	36	416	452	...	103	103	...	1,499	1,499	1,476	16
				Chopde	...	23	23	...	44	44	...	424	424	...	99	99	...	2,330	2,330	2,215	5
				Amalner	4	21	25	6	38	44	77	257	334	17	72	89	443	1,151	1,594	1,942	6
				Bhosáwal	1	27	28	4	44	48	31	332	363	5	69	74	125	717	842	815	1
					12	174	186	23	333	356	283	2,654	2,937	63	607	670	1,874	11,138	13,012	14,950	42
		2	1		21	293	314	41	552	593	664	5,225	5,889	128	1,062	1,190	3,882	19,731	23,613	29,403	133
Total.	1	5	4		78	824	902	134	1,432	1,566	2,135	13,318	15,453	371	2,500	2,871	9,469	38,141	47,610	83,723	589
		Parbhudás Hirji.	Kheda.	Mahamudábád ...	1	27	28	7	51	58	71	539½	610½	20	57	77	1,196	1,928	3,124	2,689	1
				Matar	2	21	23	11	51	62	127½	505¾	633¼	18	55	73	801	1,433	2,234	2,070	30
				Nariad	2	22	24	2	55	57	146	679¾	825¾	1	88	89	111	2,606	2,717	3,551	3
				Kupatbanj	2	8	10	5	17	22	40	177½	217½	8	34	42	515	648	1,163	3,201	7
				Thasrá	2	3	5	3	22	25	49	207½	256¾	8	48	56	252	825	1,077	2,162	3
				Anand	3	8	11	14	24	38	147½	72½	220	24	15	39	1,523	578	2,101	3,358	15
				Borsad	5	1	6	9	14	23	83½	140½	224	21	34	55	1,017	1,682	2,699	4,170	22
				Native State. Cambay ...	...	10	10	...	25	25	...	378¾	378¾	1	57	58	28	1,821	1,849	2,684	...
		1	1		17	100	117	51	259	310	664½	2,701¾	3,336¼	101	388	489	5,443	11,521	16,964	23,885	81
		Parbhurám Prânshankar.	Broach.	Broach	...	37	37	...	61	61	...	504	504	...	81	81	..	2,191	2,191	2,643	36
				Jambusar	2	36	38	5	56	61	43	534	577	10	104	114	286	2,765	3,051	3,028	...
				Amod...	1	22	23	1	40	41	12	420	432	3	47	50	59	1,000	1,059	811	11
				Wagrá	1	16	17	1	15	16	18½	168	186½	...	31	31	...	656	656	640	6
				Ankleshwar	...	25	25	...	54	54	...	501	501	...	82	82	...	1,406	1,406	1,328	11
				Hansot Pethá ...	...	...	...	...	...	...	...	...	...	...	...	...	...	..	...	724	6
		1	1		4	136	140	7	226	233	73½	2,127	2,200½	13	345	358	345	8,018	8,363	9,174	70
		Jethálál Punjaji.	Surat.	Surat City	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	2,300	77
				Chorási	1	12	13	1	34	35	50	356	406	3	44	47	137	1,809	1,946	1,424	17
				Ulpád	...	21	21	...	33	33	...	296¼	296¼	...	72	72	...	1,321	1,321	1,654	111
				Jalálpur	1	33	34	5	42	47	52½	444½	497	17	61	78	310	1,269	1,579	1,773	25
				Bardoli	2	14	16	7	22	29	72	191¼	263¼	14	45	59	582	1,081	1,663	2,637	64
				Mandvi	2	17	19	3	24	27	26½	209	235½	8	44	52	423	703	1,126	1,505	8

Name of			Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1874-76.	Deaths from small-pox in 1874.
Circle.	Collectorate.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
EASTERN GUJARATH—*concluded.*																			
MANCHARJI BERAMJI COLA, M.D.																			
Jethálál Gánpatram.	Jethálál Punjáji.		1		1														
	Surat—contd.	Chikli ...	2	8	10	7	20	27	68½	122	180½	16	23	39	705	527	1,232	1,877	3
		Balsad ...	2	8	10	7	14	21	55	744	129¼	19	9	28	661	165	826	2,189	8
		Pardi ...	1	13	14	1	18	19	9	205	214	3	22	25	59	368	427	1,802	3
		Native States { Dharmpur	3	12	15	4	17	21	49½	133½	183	11	33	44	754	1,374	2,128	3,668	...
		Native States { Bansdá	2	15	17	7	24	31	57½	163½	221	17	38	55	1,731	2,519	4,250	2,127	...
		Native States { Sachin	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	547	...
			1	16	153	169	42	248	290	440½	2,195¼	2,635¾	108	391	499	5,362	11,136	16,498	23,503	316
	Panch Mahals.	Godhra ...	5	21	26	6	34	40	93	316½	409½	22	81	103	471	1022	1,493	2,180	3
		Dohad ...	...	20	20	...	31	31	...	317	317	..	93	93	...	2719	2,719	3,112	...
		Kalol ...	2	9	11	5	27	32	69	250½	319½	7	81	88	409	1077	1,486	1,331	2
		Jhálod ...	...	4	4	...	16	16	...	151½	151½	...	39	39	...	973	973	1,932	1
		Halol ...	1	16	17	3	30	33	21	307	328	18	115	133	301	1,373	1,674	1,643	...
			8	70	78	14	138	152	183	1,342½	1,525½	47	409	456	1,181	7,164	8,345	10,198	6
	Rewa Kánthá.	Lunwádá ...	...	2	2	...	3	3	...	28½	28½	...	13	13	...	119	119	2,656	...
		Rájpipla ...	3	28	31	6	42	48	55½	367½	423	11	100	111	217	1,796	2,013	3,251	...
		Bárá ...	...	17	17	...	34	34	...	259½	259½	...	83	83	...	1,437	1,437	4,159	...
		Balasinur ...	1	...	1	2	...	2	18	...	18	3	...	3	243	...	243	1,150	...
		Chotá Udaipur ...	...	6	6	...	12	12	...	115½	115½	...	35	35	...	408	408	969	...
		Sunth ...	...	10	10	...	15	15	...	117	117	...	84	84	...	739	739	599	...
		Kadaná ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	407	...
		Sankhedá Mewas ...	...	4	4	...	13	13	...	127½	127½	...	47	47	...	396	396	774	...
		Jambugodá ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	199	...
			4	67	71	8	119	127	73½	1,015½	1,089	14	362	376	460	4,895	5,355	14,164	...
	Kánthá.	Wátrák Kánthá ...	2	...	2	4	...	4	45½	...	45½	20	...	20	768	...	768	1,089	...
		Rhewar ...	3	...	3	9	...	9	79½	...	79½	24	...	24	408	...	408	1,307	..
		Nání Márwád ...	9	...	9	19	...	19	205	...	205	87	...	87	1,821	...	1,821	5,184	...

| Western Gujarath. | Total. | Surgeon-Major Bloomfield. | | |

concluded.

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1874-75.	Deaths from small-pox in 1874.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Táluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
Major Blompfield.	Ranchoddás Mangaldás.		Northern Division.	Jasdan	2	11	13	4	22	26	47	212	259	9	26	35	493	789	1,282	2,690	...
				Limdi	1	20	21	2	43	45	20	406	426	4	57	61	184	1,977	2,161	2,711	...
				Saela	4	5	9	8	13	21	75	147	222	13	8	21	874	346	1,220		...
				Sudamda	1	...	1	4	...	4	33	...	33	8	...	8	847	...	847	2,431	...
				Muli	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...		...
				Wakaner	2	6	8	3	18	21	39	134	173	6	23	29	254	423	677		...
				Than	...	...	...	...	...	1	...	...	...	...	...	...	...	...	...	1,838	...
				Chotila	2	...	2	2	1	3	30	8	38	3	2	5	213	68	281		...
				Wadwan	2	10	12	5	22	27	59	175	234	14	25	39	893	1,007	1,900	2,572	...
					22	52	74	46	119	165	482	1,082	1,564	87	141	228	6,066	4,610	10676	16,930	...
			Western Division.	Dharol	...	...	...	...	...	..	...	...	...	...	...	...	...	...	...		...
				Judiá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	2,362	...
				Jáliá	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...		...
				Diwáni	...	...	...	...	...	...	...	...	...	...	...	..	...	...	...		...
				Dráphá	...	...	..	...	...	...	...	...	...	...	...	...	...	...	...	1,868	...
				Kondurná	...	2	2	...	12	12	...	95	95	...	17	17	...	518	518		...
				Dhoráji	..	4	4	...	23	23	...	163	163	...	30	30	..	1,042	1,042	3,075	...
				Gondal	1	11	12	1	17	18	18	132	150	2	17	19	166	445	611		...
				Wasawar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	2,567	...
				Sultánpur	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...		...
				Morvi	2	...	2	5	...	5	53	...	53	13	...	13	669	...	669		...
				Tankárá	...	2	2	...	24	24	...	147	147	...	19	19	...	632	632	3,550	...
				Bhánwad	...	6	6	...	9	9	...	85	85	...	12	12	...	178	178		...
				Jodhpur	...	7	7	...	12	12	...	99	99	...	12	12	...	539	539	2,184	...
				Khambaliá	...	17	17	...	24	24	...	201	201	...	24	24	...	605	605	2,443	...
				Nawánagar	2	11	13	5	26	31	137	283	420	8	34	42	551	862	1,413	2,757	...
				Rajkot	2	13	15	4	24	28	61	173	234	5	48	53	335	751	1,086		...
				Gawaridhar	...	...	...	...	3	3	...	26	26	...	6	6	...	75	75	4,844	...
				Pal	...	...	...	...	...	..	...	...	...	...	...	...	...	...	...		...
				Porbandar	...	7	7	...	24	24	...	156	156	...	18	18	...	1,127	1,127	2,007	...
1	2				7	80	87	15	198	213	269	1,560	1,829	28	237	265	1,721	6,774	8,495	27,657	...

WESTERN GUJARATH—	Surgeon	Balkrishna Ramchandra.	Southern Division.	Didan	...	2	2	...	3	3	...	27	27	...	4	4	..	180	180	2,436	...
				Jafrabád	2	4	6	4	8	12	39	73	112	7	15	22	347	431	778		...
				Bántwá	...	12	12	...	25	25	...	127	127	...	33	33	...	1,403	1,403	2,443	...
				Mánikwádá	...	2	2	...	3	3	...	22	22	...	1	1	...	11	11		...
				Bilká	...	...	...	...	...	...	..	...	...	...	...	...	...	...	...	2,095	...
				Bagusrá	...	7	7	...	18	18	...	119	119	...	24	24	...	741	741		...
				Jaitpur	1	4	5	1	12	13	13	72	84	3	18	21	124	404	528	2,526	...
				Junagarh	3	11	14	3	20	23	37	129	166	3	28	31	165	661	826	2,438	...
				Mángarul	2	11	13	2	24	26	32	154	186	2	24	26	238	702	940	1,142	...
				Una	2	6	8	6	11	17	49	103	152	8	23	31	400	225	625	2,433	...
				Virávval	2	7	9	6	10	16	43	52	95	9	6	15	487	164	651		...
				Chorwad	...	1	1	...	3	3	...	12	12	...	2	2	...	54	54	1,327	...
					12	67	79	22	137	159	212	890	1,102	32	178	210	1,761	4,976	6,737	16,840	...
			Eastern Division.	Bhawnagar	6	9	15	19	24	43	250	178	428	36	15	51	2,218	404	2,622	1,602	...
				Botal	...	10	10	...	11	11	...	93	93	...	16	16	...	292	292	1,903	...
				Lathi	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...		...
				Kundala ... —	...	14	14	...	8	8	...	143	143	...	27	27	...	883	883	2,253	...
				Mowa	1	6	7	3	12	15	26	137	163	5	28	33	414	605	1,019	2,569	...
				Shehor	...	2	2	...	1	1	..	12	12	...	1	1	...	33	33	1.704	...
				Talaja	2	3	5	5	3	8	41	54	95	11	...	11	633	...	633	2.352	...
				Palitana	...	7	7	...	14	14	...	83	83	...	19	19	...	571	571	2.323	..
				Wala...	...	3	3	...	4	4	...	36	36	...	4	4	...	145	145	2,400	...
		1	2		9	54	63	27	77	104	317	736	1,053	52	110	162	3,265	2,933	6,198	17,106	...
		...	...	Gaikawad's territory.	2	1	3	2	1	3	24	12	36	...	...	...	...	...	...	...	...
Total.	1	3	6		58	345	403	128	851	979	1,489	7,380	8,869	237	1,126	1,363	15129	37,348	52,477	116,535	388
SINDH.	J. WILLIAMS, M.D., Surgeon	Lachman and Gangaram.	Karachi.	Karáchi	...	10	10	...	6	6	...	166	166	...	19	19	...	97	97	618	...
				Do. town ...	4	6	10	6	42	48	383	554	937	2	4	6	490	1,330	1,820	4,307	8
				Dadu	2	2	4	2	3	5	52	59	111	3	24	27	89	356	445	3,976	...
				Sehwan	2	5	7	2	12	14	50	247	297	10	68	78	83	405	488	1,664	...
				Manjhanda	3	4	7	3	4	7	43	97	140	...	...	...	...	...	...	202	...
				Kotri	10	13	23	13	30	43	472	621	1,093	29	57	86	168	645	813	2,390	...
				Kohistan	...	..	...	...	...	...	...	...	...	...	...	...	...	...	...		...
				Tatta	3	5	8	3	13	16	87	218	305	2	51	53	638	379	1,017	1,591	...
				Mirpur Sakra ...	2	11	13	2	25	27	40	408	448	3	3	6	201	36	237	1,326	...
				Ghorabari	5	18	23	9	33	42	113	413	526	20	89	109	818	518	1,336	1,278	...
				Shahbandar	3	18	21	5	20	25	80	258	338	29	58	87	475	236	711	1,353	1
				Jati	2	55	57	4	78	82	126	976	1,102	7	231	238	358	975	1,393	2,442	9
				Bela	4	1	5	4	1	5	49	8	57	15	1	16	519	15	534	...	...
				Mirpur Batora ...	3	11	14	3	19	22	59	321	360	12	116	128	775	702	1,477	2,103	...
		1			43	159	202	56	286	342	1.534	4,346	5,880	132	721	853	4.614	5,694	10,308	23,250	18

—*concluded.*

M.D., Surgeon.

Circle.	Name of Collectorate.	Taluká.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1874-75.	Deaths from small-pox in 1874.
			Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.	Superintendent.	Assistant Superintendent.	Total.		
Asu Mal and Gangaram.	Halárkhá.	Haidrábad ...	1	9	10	4	16	20	25	287	312	9	22	31	279	219	498	3,117	...
		Do. town ...	...	3	3	3	4	7	20	128	148	2	3	5	64	108	172	2,003	...
		Guni	2	18	20	2	32	34	22	311	333	1	29	30	50	208	258	1,815	...
		Baga	1	7	8	1	7	8	27	111	138	...	5	5	...	91	91	3,329	...
		Baddin ...	...	54	54	...	73	73	...	906	906	...	60	60	...	1,840	1,840	7,546	...
		Dera Mohabat ...	...	1	1	...	1	1	...	19	19	...	...	...	...	...	...	684	...
		Aliyar	1	9	10	2	14	16	62	274	336	6	14	20	172	236	408	2,882	1
		Mirpur Khas ...	1	...	1	1	...	1	20	...	20	...	...	...	...	...	...	...	...
		Shahdadpur ...	4	17	21	5	21	26	61	346	407	8	38	46	251	747	998	3,974	...
		Hala	2	21	23	3	22	25	52	196	248	7	57	64	166	1,390	1,556	3,464	...
		Sakrand	2	1	3	2	4	6	32	43	75	11	8	19	98	66	164	2,607	...
		Mora	2	2	4	2	2	4	46	32	78	7	4	11	204	105	309	2,318	...
		Naoshero ...	1	4	5	4	7	11	50	52	102	23	16	39	314	296	610	3,229	...
		Khaudiara ...	1	21	22	2	21	23	20	478	498	11	24	35	96	332	428	3,930	...
	1		18	167	185	31	224	255	437	3,183	3,620	85	289	365	1,694	5,638	7,332	40,908	1
Mehrchand and Hasá Mal.	Shikárpur.	Shikarpur ...	1	10	11	1	36	37	26	425	451	4	37	41	91	336	427	2,558	...
		Do. town ...	1	3	4	1	3	4	26	30	56	1	3	4	87	131	218	1,617	...
		Rohri	1	6	7	2	11	13	23	194	217	19	52	71	195	573	768	2,575	...
		Do. town ...	1	1	2	1	1	2	...	20	20	1	1	2	31	92	123	321	...
		Saidpur	2	6	8	2	10	12	24	240	264	19	40	59	90	139	229	1,215	...
		Ghotki	...	16	16	...	17	17	...	395	395	...	14	14	...	19	19	2,557	1
		Mirpur Matelo ...	3	19	22	5	23	28	91	408	499	25	53	78	363	803	1,165	4,010	...
		Obaoro	1	37	38	2	58	60	44	1,181	1,225	9	110	119	413	1,557	1,970	5,401	1
		Sakkar	1	5	6	1	10	11	30	249	279	6	59	65	103	489	592	2,690	...
		Do. town ...	...	...	...	1	...	1	2	...	2	1	1	2	24	64	88	1,339	...
		Naoshero	1	6	7	1	13	14	14	166	180	3	30	33	32	468	500	3,497	...
		Sujawal	1	2	3	1	2	3	50	48	98	4	1	5	40	8	48	1,013	...
		Ratedera	1	6	7	1	11	12	6	137	143	1	25	26	5	300	305	1,429	...
		Larkhana	2	4	6	3	8	11	49	146	195	10	26	36	94	246	340	2,989	...
		Kambar	1	3	4	1	6	7	37	106	143	4	10	14	30	99	129	2,131	...
		Nasirabad	1	4	5	1	8	9	18	148	166	8	36	44	179	525	704	1,760	...
		Labdarya	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	466	...
		Tigr	3	9	12	3	11	14	66	171	237	10	47	57	163	687	850	3,940	...
		Mehar	...	2	2	...	2	2	...	64	64	...	1	1	...	7	7	175	...
		Kakar	1	9	10	1	11	12	34	155	189	6	27	33	40	248	288	1,940	3
	1		22	148	170	28	241	269	540	4,283	4,823	131	573	704	1,979	6,791	8,770	43,623	5

Sindh	J. Williams,	Hásá Mal, and Meharchand.	Upper Sindh Frontier.	Jacobabad	2	1	3	2	1	3	54	14	68	11	...	11	241	...	241	2,000	...
				Kasmar	3	8	11	3	22	25	44	231	275	6	32	38	136	392	528	1,519	...
				Thul	2	...	2	2	...	2	29	...	29	1	...	1	32	...	32	1,402	2
			1		7	9	16	7	23	30	127	245	372	18	32	50	409	392	801	4,921	2
		Lál Baksh.	Thar and Párkar.	Umarkot	5	37	42	5	38	43	80	420	500	15	49	64	270	550	820	4.130	1
				Chachra	6	26	32	7	28	35	132	391	523	13	30	43	675	542	1,217	3,978	3
				Nagar Parkar ...	5	146	151	5	139	144	110	2,519	2,629	18	91	109	319	1,178	1,497	4,189	1
				Mitti	2	16	18	2	16	18	54	303	357	1	...	1	42	...	42	3.540	...
				Dipla	1	2	3	1	2	3	49	48	97	1	...	1	36	...	36	2,147	...
				Kipra...	4	..	4	4	...	4	60	...	60	1	...	1	10	..	10	497	...
				Sanghar	...	...	...	1	...	1	20	...	20	6	...	6	24	...	24	1.584	...
				Jodhpur	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	189	...
			1		23	227	250	25	223	248	505	3,681	4,186	55	170	225	1,376	2,270	3,646	20,254	5
			Native State.	Khairpur	3	27	30	6	60	66	78	930	1,008	79	204	283	1.544	3,328	4,872	9.699	...
			...	Goadar	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	112	...
Total	1	6	5		116	737	853	153	1,057	1,210	3,221	16668	19889	500	1,980	2,480	11616	24,113	35,729	1,42.767	31
Baroda.	G. Edwin Seward, M.D., Surgeon Major.	Sudáram Ichárám.	Baroda.	H. H. the Gaikawad's territory.	...	..	...	...	...	...	...	...	...	...	...	...	...	...	...	29,795	...
Kutch.	Dora'ji Hormasji, G.G.M.C.	Jadhawaji Surji.	Kutch.	H. H. the Rao's territory.	...	50	50	...	70	70	...	486½	486½	...	105	105	...	1,447	1,447	3,034	...

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1874-75.	Deaths from small-pox in 1874.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Táluká.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
ADEN.	...	...	Aden.	Aden	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	1,097	...
MUSCAT.	...	...	Muscat.	Muscat	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	144	...
Grand Total.	8	31	34		455	4,309	4,764	787	7,191	7,978	11209½	72922½	84132	1954	12037	13991	74605	2,67,239	3,41,844	7,25,344	3,903

J. PINKERTON, M.D., Surgeon-Major,
Superintendent General of Vaccination, Bombay Presidency.

Bombay, 24th May 1875.

No. 2349.

GENERAL DEPARTMENT.

Bombay Castle, 6th August 1875.

Letter from the Surgeon General, Indian Medical Department, No. 2085, dated 9th July 1875—Forwarding, with remarks, the report of the Vaccination Department for the year 1874-75.

RESOLUTION.—The Surgeon General in forwarding this report has given a brief account of all the more salient results. Government will, therefore, content themselves by recording their opinion that these results are, as usual, highly satisfactory, and do credit to Dr. Pinkerton and his subordinates. The increase in infant vaccination especially is a matter for congratulation.

2. Government have pleasure in remarking the improvement in the Southern Circle, which was unfavourably noticed last year.

3. The returns clearly show that compulsory vaccination in this Presidency is quite unnecessary. It is doubtful whether, if it were introduced, there would be any appreciable increase in the numbers vaccinated on the present voluntary system, while the name of compulsion would excite suspicion and render the operation unpopular.

4. The Sholapur Municipality have carried a Resolution that 'animal vaccination is contrary to the principles of the Hindu Religion, and should not be introduced.' When they see other Municipalities adopting the system without damage to Hindu orthodoxy, their scruples may be removed. In the same way the Lingáyats of Nargund and Ron will doubtless relax their opposition if treated with tact.

5. The attention of the Collector of Sholapur should be invited to the 80th paragraph of Dr. Pinkerton's report. Additional Vaccinators seem required for Karmála and Mádha.

6. The Superintendents and Assistant Superintendents have been active in their inspections. Drs. Williams and Cody especially deserve commendation for their energy.

7. The total cost of the Department was Rs. 2,20,663-5-9, of which—

Rs.	1,07,444	12	3	was	Provincial.
„	15,686	14	0	„	Municipal.
„	59,753	8	11	„	Local.
„	37,778	2	7	„	Native Chiefs.

The average cost of each successful vaccination was annas 5-4, or 10 pies less than in 1873-74, which is satisfactory. Deducting the cost of the Superintendents, it was only annas 3-11, varying from annas 3-3 in Sind to annas 8-9 in Bombay and annas 14-8 in Cutch. Government would be glad to know whether vaccination cannot be made less expensive in the Presidency town. The average number vaccinated by each Vaccinator varied from 275

in Cutch and 919 in Bombay to 2,790 in Sind. So that, taking the working days of the year at 300, each Vaccinator in Sind operated on 9 persons daily, while in Bombay the number was only 3, although the population in Sind is widely scattered and that in Bombay is just the reverse.

8. Government concur with the Superintendent General in considering the punishment of fine to a Vaccinator who falsifies his returns as wholly inadequate. Such an offence is invariably to be punished by dismissal.

9. Government are not prepared to pay for a Vaccinator in the Dangs, but it is clearly desirable that the people there should be protected. The question should be referred for the consideration of the Political Agent in Khandesh.

10. The addition of sanitary work to the duties of the Vaccination Department is a measure which will enable that efficient but expensive body to show greater returns of work, and it will, the Government are confident, be attended with excellent results to the country generally.

11. The Government of India have recently drawn attention to the necessity for economy in printing annual reports. Government recognize, in the length of that under review, the careful attention to minute details, which, coupled with the zeal Dr. Pinkerton has infused into his subordinates, has rendered the work of the Department so satisfactory. But they trust that the Superintendent General will be able next year to condense a good deal of his information, especially that towards the conclusion of the report.

12. Copies of the Report and this Resolution should be sent to the Secretary of State as usual.

W. G. PEDDER,
Acting Secretary to Government.

To

The SURGEON GENERAL, INDIAN MEDICAL DEPARTMENT,
The SANITARY COMMISSIONER,
The MUNICIPAL COMMISSIONER for the CITY of BOMBAY,
All COLLECTORS, including the COLLECTORS and POLITICAL SUPERINTENDENTS in SIND, and the EXTRA FIRST ASSISTANT COLLECTOR in charge PANCH MA'HA'LS,
The REVENUE COMMISSIONER, S. D.,
The REVENUE COMMISSIONER, N. D.,
The COMMISSIONER in SIND,
The POLITICAL DEPARTMENT of the SECRETARIAT,
The SUPERINTENDENT, GOVERNMENT CENTRAL PRESS.

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SIND

FOR THE YEAR 1875-76.

Bombay:

PRINTED AT THE GOVERNMENT CENTRAL PRESS.

1876.

INDEX.

	Para.	Page.
Act, Compulsory Vaccination	3	1
Ages of those vaccinated	19	8
Aid from civil and political officers	66	26
Animal vaccination	26	11
Assistant superintendents, work of	38	15
Average number of operations by each vaccinator ...	63	24
,, ,, ,, ,, ,, by circles ...	64	24 & 25
,, ,, ,, ,, ,, by establishments...	63	24
Cantonments, supervision of vaccinations in	4	2
Castes of those vaccinated	18	8
Cholera interfered with work	107	31
Circle, Baroda, progress in	105	31
,, Central ,, ,, ...	69 to 75	26 & 27
,, Cutch ,, ,, ...	106	31
,, Eastern Guzerat ,, ...	88 to 93	29
,, Presidency ,, ,, ...	68	26
,, Southern ,, ,, ...	76 to 81	27 & 28
,, Sind ,, ,, ...	98 to 105	30 & 31
,, Western ,, ,, ...	82 to 87	28 & 29
,, Western Guzerat,, ...	94 to 97	30
Contemplated changes in circles	2	1
Cost of each successful case, excluding pay of superintendents.	32	12 & 13
,, ,, ,, ,, including all charges ...	33	13
,, ,, ,, ,, by establishments	34	13
Deaths from small-pox	44	16
,, ,, ,, in Bombay	53	19
,, ,, ,, in Kaira and Surat collectorates, discrepancies in	48	17 & 18
Expenditure	28	12
,, a fair share of, should be debited to general sanitation	31	12
Health officers, duties and work of	110	32 & 33
Heifers inoculated in Bombay, number of	26	11
Infantile vaccinations, percentages of	20	8
Inoculation, practice of	42	16
Inspections of dispensaries	109	31
,, by superintendents	35	13 & 14
,, ,, ,, from registers	36	14
,, total and rate per cent. of	39	15
Lymph, cow, from Belgium	27	11
,, English, annual supply desirable	25	10
,, in use, conditions of	24	10
Measles	108	31
Primary vaccinations	13	6
,, ,, excess in	14	6
Rate per mille of population protected	23	9 &
Result of operations	21	8 & 9

	Para.	Page.
Result of operations by establishments	22	9
Re-vaccinations	15	6 & 7
,, excess in	15	6
Sexes of those vaccinated	17	7 & 8
Small-pox	44	16
,, after good vaccination, &c.	55	20 to 22
,, by circles	45 to 54	17 to 20
,, protection, &c., in cases of, how to be noted ...	54	20
Superintendents, commendation of	37	15
Strength of department	5	2 & 3
Tours	65	25
Vaccinations, number of	8	4
Vaccinators, conduct of	41	16
,, dismissed for falsifications	40	16
,, want of more, in Poona and Ratnágiri collectorates	7	4
Vaccino-syphilis	43	16
Work in army	62	24
,, in circles	9	4 & 5
,, in dispensaries	61	24
,, increases in, by establishments	11	5
,, of Government vaccinators	57	22
,, of Local Fund ,, ...	59	23
,, of Municipal ,, ...	58	22 & 23
,, of Native States ,, ...	60	23 & 24
APPENDICES.		
Statement of persons primarily and successfully vaccinated for ten years		36 & 37
,, of vaccinations by establishments		*ib.*
,, No. I, particulars of vaccination		38 to 55
,, No. II, monthly number and results of vaccinations. ...		56 to 59
,, No. III, expenditure		60 to 72
,, No. IV, results of vaccination for six years		73
,, No. V, vaccinations in dispensaries		74 to 83
,, No. VI, vaccinations and small-pox in army		84 to 86
,, No. VII, inspections and small-pox deaths		88 to 98

No. 2631 of 1876.

From

The SURGEON-GENERAL,
Indian Medical Department,

To

The SECRETARY to GOVERNMENT,
General Department.

Bombay, 4th July 1876.

Sir,

I have the honour to forward the annual report on vaccination for 1875-76.

2. This report shows that vaccination has been considerably extended at a comparatively less cost than in any one of the preceding 7 years. No changes of any importance have taken place in the system during the year, but that of placing the vaccination of civil populations in cantonments under this department.

3. There were 4 more vaccinators employed during the year.

4. The total number of persons vaccinated and re-vaccinated was 808,353, or 75,729 of an increase over the previous year, of which 18,822 were primary vaccinations and 56,907 re-vaccinations. It is very gratifying to observe that there were 22,573 infantile vaccinations more than in the preceding year: so, the percentage being 46 on the total, 3 higher than in 1874-75. The whole increase in primary vaccinations has been among infants, the best possible sign of satisfactory progress that could be offered. The great increase in re-vaccinations is chiefly noticed in Sind and the city of Bombay. In the latter it is wholly due to the recent severe epidemic of small-pox. Considering that in the previous report Dr. Pinkerton estimated that eight-tenths of the available children were primarily vaccinated, it is obvious that future progress must be slow.

5. The disparity between the sexes is again less, but Aden and Bombay city still show a large excess of males. In the former it is satisfactorily accounted for in this report by Dr. Hay, and the same reason may be said to hold good in Bombay, viz., the objection of parents to bring their grown-up girls into public.

As regards caste, there is a large increase of Hindus and a decrease of Musalmans, chiefly in Sind, where the subjects for primary vaccination are said to have been fewer. The number of Parsis is fully double that mentioned in the previous report, the result of the epidemic in Bombay.

6. The percentage of success in primary vaccinations was 97, being higher than in the previous year; in re-vaccinations it was 85·2, also higher; but there is considerable doubt of this latter percentage being correct, owing to the difficulty of determining what is a success. It would, I think, be well were re-vaccinations tabulated under the heading "perfect" and "imperfect success", instead of "successful" and "unsuccessful"; this, although open to the objection that the vaccinators are not scientifically trained medical officers, yet would, in my opinion, be an improvement, and give more precise information on this point.

7. The work has been carried on in a population of 25,167,234. In British territory 27·1 per mille of population were successfully vaccinated primarily, and in native states 24·4. These figures show an increase, respectively, of 0·2 and 2·1, and, on the whole Presidency, 26·2 of primary successful vaccinations to population.

8. The lymph, generally, was good, but in 4 circles had to be renewed. The usual annual supply of lymph from England was not received; and I concur with Dr. Pinkerton that the Secretary of State should be asked to send out 2 supplies, of 45 tubes each, in October and November. Cow-lymph has been kept up in Bombay throughout the year, and was found of the utmost value during the epidemic;—in fact, without it, vaccination could not have been carried on at all. Animal vaccination was also carried in Poona and Bársi. I have also information that Surgeon-Major C. Johnson, of the 3rd Regiment N. L. I., has introduced animal vaccination at Kolhápur, and it has been practised by Honorary Surgeon Sinclair in charge of the civil duties there.

9. The total cost was Rs. 2,22,802, or 2,138 of an increase, which is entirely in the grants from municipalities, local funds, and native states, there being a decrease of Rs. 1,874 in the Government expenditure. Including all expenditure, the cost of each successful case was 4 annas 11 pies, or 5 pies less than in the preceding year, and less than in any year of the last seven.

10. The inspections of 6 superintendents and of their 30 assistants were made in 13,038 villages, and they embraced

395,657 vaccinated persons, which is almost 50 per cent. of the work of the year. I regret to observe that 12 vaccinators were dismissed for falsification—2 in British territory and 10 in native states, 8 of whom were in Kattywar. The Superintendent General of Vaccination, however, informs me the falsifications were not numerous, and, in the case of those in British territory, were made by young hands.

11. The conduct of the vaccinators has been, with the above exceptions, generally good; that of the assistant superintendents has also been good, with the exception of one in Kattywar and another in the southern circle. Dr. Pinkerton says they have worked zealously and well.

12. I regret to notice that inoculation is still said to be practised in Cutch, and that it has been so quite recently in the Ratnágiri collectorate. If Government have the power of prohibiting this, I think it should be exercised, now that each taluka has its vaccinator.

13. In no instance was syphilis observed to have been communicated by vaccination.

14. The deaths from small-pox were 298 fewer than in the preceding year; but it is clear from Dr. Colah's and Mr. Ananta Chandroba's investigations that these statistics are, at present, very incorrect. Dr. Pinkerton has introduced a form on the reverse of the usual vaccination return, seen at page 20 of the report, which, if carefully filled up by medical officers, will be of great use in determining the exact value of vaccination at a future period.

15. The progress, as shown by circles, is satisfactory, the presidency, southern, and central circles showing the greatest advance; that in the two first being of the greatest importance, as there is still room in these circles for a further advance. The increase is very creditable to Dr. Raby; and I concur with Dr. Pinkerton, that Mr. Assistant Surgeon Ananta Chandroba highly deserves the thanks of Government for his zealous and unintermitting labours during the epidemic.

16. I am glad to observe that the superintendents used every opportunity of inspecting the dispensaries, and of giving advice regarding sanitation. I have much pleasure in bringing to the notice of Government the report, by the Superintendent General, that all these officers worked well, and performed their duties to his entire satisfaction. Dr. Pinkerton especially notices Drs. Williams and Cody as having their circles in perfect order. Government

will be pleased to notice the efforts of Dr. Dorabji Hormasji, medical officer to H. H. the Rao of Cutch, to improve the state of vaccination in his territory.

17. It is gratifying to notice the remark by Dr. Pinkerton in para. 111, that the past year's work is the best he has ever recorded. The work of vaccination has been so ably superintended by this officer for above 8 years, as evidenced by the yearly progress it has made, that I cannot but regret the possibility of his appointment being abolished; and I feel sure Government will gladly recognize the great value of the services of this officer in this special department of sanitation.

I have the honour to be,

Sir,

Your most obedient Servant,

WM. THOM, F.R.C.S.,

Surgeon-General.

REPORT

ON

VACCINATION THROUGHOUT THE BOMBAY PRESIDENCY AND SIND

FOR THE YEAR 1875-76.

This is the eighth annual report of the Superintendent General of Vaccination. As usual, it will show: 1st, the work of the past year as a whole; 2nd, the progress vaccination has made in each district; and, 3rd, the tables of figures, in which the number of vaccinations, cost, &c., are given in the forms ordered by the Government of India. Divisions of Report.

2. No change has been made in the circles of vaccination; but a proposal is now before the Government of India which, if approved, will cause the circles to be arranged after the manner of the registration divisions. The circles will then stand thus:—1st, Presidency Circle will include the island of Bombay as at present. 2nd, Konkan Circle will include all the districts below the ghâts except the city of Bombay. 3rd, Deccan Circle will include all the districts above the ghâts north of Satara. 4th, Southern Mahratta Circle will include all the districts above the ghâts south of the Deccan Circle. 5th, Guzerat Circle will embrace the whole of Guzerat. 6th, Kattywar Circle will include the province of Kattywar and Pálanpur States. 7th, Sind Circle will embrace, as at present, the whole of the province of that name. In addition to these circles there are the other two in native states—viz. 8th, Baroda Circle and, 9th, Cutch Circle—which embrace the territories of the respective states. No changes in Circles. Contemplated changes in Circles.

3. There has been no change in the "Bombay System of Vaccination" during the year, but a severe epidemic of small-pox in the city of Bombay has again directed the mind of the public to the advisability of having a Compulsory Vaccination Act for the city of Bombay. Such a Bill (No. 4 of 1872) was before the Legislative Council in 1872, but was not carried through. I have written a memorandum on the subject of small-pox epidemics in the city of Bombay, and have recommended that a compulsory vaccination Act for the city of Bombay be passed; and I have re-drafted the Compulsory Vaccination Act.

Compulsory Vaccination Bill in accordance with the suggestions made by the Government of India. The subject is now before Government.

Cantonments situated within Circles to be under Superintendents of Vaccination.

4. This Government in their Resolution No. 3550, dated 26th November last, under instructions from the Government of India, ordered that the vaccination of all cantonments situated within vaccination circles shall be under the circle superintendents of vaccination; and with reference to this, I recently submitted to the Surgeon-General a detail of the changes and arrangements necessary to carry out the orders. The principles laid down by the Government of India are:—

A.—In all cantonments situated within the limits of a vaccination circle the work shall be done under the supervision and direction of the superintendent of that circle.

B.—In cantonments not situated within the limits of a vaccination circle, the work shall be done under the supervision and direction of the local civil surgeon.

C.—The staff surgeon, or, where there is no staff surgeon, the senior medical officer in the cantonment should co-operate with the superintendent of vaccination or local civil surgeon, as the case may be, and render him every practicable assistance that may be required.

D.—In cantonments to which Rule A or B does not apply, the work shall be done by the staff surgeon himself, or, if there is no staff surgeon, by the senior medical officer.

E.—In all cantonments in which the native * non-military population amounts to or exceeds 10,000, a special vaccinator shall be appointed and paid from cantonment funds.

* All natives residing within cantonment limits except native soldiers.

F.—In all cantonments in which the native † non-military population amounts to or exceeds 5,000, but is less than 10,000, the cantonment funds shall contribute half the yearly salary of a vaccinator; cantonment committees being at liberty to have a special vaccinator of their own if their funds admit of it.

† All natives residing within cantonment limits except native soldiers.

G.—In the case of cantonments which have a native non-military population exceeding 5,000, and which are unable to meet wholly or partly the salary of a vaccinator, special application should be made to the Government of India through the Commander-in-Chief for the disbursement of that salary from the Imperial revenues.

To carry out these orders will involve very few changes in this Presidency, as they are almost identical with the method which has been in use for years past.

Strength of Department.

5. The strength of the department, as compared with the preceding year, is shown below in Table No. I:—

Table No. I.

Number.	Circles.	Area in Square Miles.	Population.	1875-76.																1874-75.													
				Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Number of Vaccinators.						Number of Peons.					Total Strength.	Superintendent General.	Superintendents.	Assistant Superintendents.	Clerks.	Number of Vaccinators.						Number of Peons.					Total Strength.
								Government.		Municipal.	Local Funds.	Native States.	Total.	Government.	Municipal.	Local Funds.	Native States.	Total.						Government.		Municipal.	Local Funds.	Native States.	Total.	Government.	Municipal.	Local Funds.	Native States.	Total.	
								Civil.	Military.															Civil.	Military.										
1	Presidency	19	644,405	1	1	..	2	..	..	16	..	..	16	4	5	..	..	9	29	1	1	..	2	..	..	16	..	..	16	4	5	..	..	9	29
2	Central	28,286	4,866,162	..	1	6	2	..	..	9	48	6	63	10	9	48	6	73	145	..	1	6	2	..	..	9	48	6	63	10	9	48	6	73	145
3	Southern	25,569	4,762,457	..	1	5	2	..	..	7	41	26	74	8	5	41	30	84	166	..	1	5	2	..	..	8	38	26	72	8	7	38	29	82	162
4	Western	28,361	3,109,370	..	1	5	2	..	..	4	43	4	51	9	3	43	1	56	115	..	1	5	2	..	..	4	42	4	50	9	3	42	1	55	113
5	Eastern Guzerat ..	15,939	3,147,853	..	1	4	2	..	..	3	25	18	46	8	3	25	15	51	104	..	1	4	2	..	..	3	25	18	46	8	3	25	15	51	104
6	Western Guzerat .	30,224	3,642,969	..	1	3	2	2	..	5	8	39	54	9	5	8	39	61	121	..	1	3	2	2	..	5	7	39	53	9	5	7	39	60	119
7	Sind	49,306	2,328,765	..	1	5	2	..	..	5	42	2	49	9	3	42	2	56	113	..	1	6	2	..	..	5	43	2	50	10	3	43	2	58	117
8	Baroda	10,767	2,000,225	..	1	1	1	..	..	..	..	23	23	..	..	..	24	24	50	..	1	1	1	..	..	..	..	23	23	..	..	..	25	25	51
9	Cutch	6,500	487,305	..	1	1	..	..	..	..	..	12	12	..	..	..	9	9	23	..	1	1	..	..	..	..	..	11	11	..	..	..	6	6	19
	Aden	11	19,289	..	..	..	..	..	..	1	..	..	1	..	..	..	..	..	1	..	..	..	..	..	..	1	..	..	1	..	..	..	..	..	1
	Military Stations ..	..	158,434	..	..	..	..	..	4	..	..	..	4	..	..	..	..	..	4	..	..	..	..	..	4	..	..	..	4	..	..	..	..	..	4
	Total..	194,982	25,167,234	1	9	30	15	2	4	50	207	130	393	57	33	207	126	423	871	1	9	31	15	2	4	51	203	129	389	58	35	203	123	419	864

Increases and Decreases in Establishments.

6. All the vaccinators, except the 6 in Government employment, are paid by municipalities, local fund committees, and native states. The municipalities maintained 50, or 1 less than in 1874-75; the local funds 207, or 4 more; the native states 130, or 1 more; and Government 6—total 393, being an increase over the preceding year of 4. The Gokák municipal vaccinator was abolished in May: 3 additional local fund vaccinators were at work in Belgaum, 1 more in Ahmedabad Zillah, and 1 more in Násik Zillah: and 1 less than the sanctioned establishment was employed in the Upper Sind Frontier District. In native states Cutch has added 1 to the establishment, and another has been sanctioned for Rájpipla.

A few more vaccinators required.

7. A few more local fund vaccinators are still required, especially in the more populous talukas of the zillahs of Poona and Ratnágiri, and we will get them gradually as the local fund committees can afford to give higher grants for vaccination.

Number vaccinated.

8. During the year there have been increases in the number of persons vaccinated and re-vaccinated in all branches of the department, as shown below in Table No. II. The total increase is 75,729:—

Table No. II.

1875-76.			1874-75.	
Primary Vaccinations.	Re-vaccinations.		Primary Vaccinations.	Re-vaccinations.
		In Civil Life.		
664,030	112,272	Itinerant Establishment.	646,574	57,578
19,954	3,790	Dispensary Establishment.	19,393	1,799
683,984	116,062		665,967	59,377
800,046		Civil Life Total.	725,344	
8,307		Army Total.	7,280	
808,353		Total vaccinations in Bombay Presidency.	732,624	

Work by Circles.

9. Table No. III. shows the amount of work done in each circle, as well as the increase and decrease. The army returns are excluded:—

Table No. III.

Circles.	Total number of persons vaccinated and re-vaccinated.		Compared with the preceding year.	
	1875-76	1874-75	Increase.	Decrease.
1. Presidency ...	35,658	14,707	20,951	...
2. Central ...	141,813	130,347	11,466	...
3. Southern ...	126,535	112,551	13,984	...
4. Western ...	85,442	83,723	1,719	...
5. Eastern Guzerat.	88,113	90,644	...	2,531
6. Western do. ...	121,379	116,535	4,844	...
7. Sind	155,043	142,767	12,276	...
8. Baroda	38,639	29,795	8,844	...
9. Cutch	5,242	3,034	2,208	...
Aden	2,182	1,097	1,085	...
Muscat	...	144	...	144
	800,046	725,344	77,377	2,675
		Deduct Decrease...	2,675	
		Net Increase...	74,702	

10. There is an increase in all circles except one, but the greatest advance has been made in the Presidency and Southern circles, where there is most room for it; there are also very good increases in the Central and Sind circles, but in the latter the increase is wholly due to the number of re-vaccinations, as there is an actual decrease in the primary vaccinations.

Increase in all circles except one.

11. In Table No. IV. is shown the increase obtained by each establishment, and from the total is deducted the small decrease of 75 in the Government establishment. The greatest increase is noticed in the local fund establishment, but there is very good progress indicated by the municipal and native states' vaccinators. Although the net increase is not quite as high as it was in the year preceding, still it is very satisfactory. There must be, of course, a limit to the annual increase.

Increase in each Establishment.

Table No. IV.

207	Vaccinators, Local Fund	34,662
130	,, Native States	15,797
50	,, Municipal	21,766
...	Dispensaries	2,552
4	Vaccinators, Army	1,027
	Increase ...	75,804
	Deduct—Decrease.	
2	Vaccinators, Government	75
	Net Increase ...	75,729

12. In the British army returns no distinction is made between primary and re-vaccinations; I shall consider them all primary.

Primary vaccinations.

13. The total number of persons primarily vaccinated was 690,639, being an increase of 18,822 over the year 1874-75. Table No. V. shows the number by each establishment. It could hardly be expected that the increase in primary vaccinations would be great, seeing it was estimated in last report that they had amounted to eight-tenths of the available children in the year 1874-75. Future extension must now be very slow and gradual.

Table No. V.

Itinerant Establishment ...	664,030
Dispensary do. ...	19,954
British Army	825
Native do.	5,830
Total primary vaccinations...	690,639

Excess of operations over the number of persons vaccinated.

14. There were 4,699 operations more than persons; that is to say, so many secondary operations were performed on persons who had been unsuccessfully vaccinated. I wish more of the 20,351 unsuccessful cases had been operated on a second time, but I know that many mothers object to a second operation immediately after a failure.

Re-vaccinations.

15. The total number of persons re-vaccinated was 117,714, or 56,907 more than in the preceding year. In this table is shown the number in each circle. There is a large increase in the Sind and Presidency circles, and considerable progress in the Southern, Central, and Guzerat circles. Re-vaccination is making quite as much progress as can be expected. While there is a great increase in Sind in respect to re-vaccinations, there is a considerable decrease in primary vaccinations, due, Dr. Williams says, to want of subjects and much attention having been given to re-vaccination. There were 960 operations more than persons; that is to say, so many persons were operated on more than once. In the two talukas of Badin and Bago Tando, in Hyderabad Zillah, there were 12,001 persons re-vaccinated, or 120 per mille of population. Dr. Williams says :—"The more or less constant "presence of small-pox in these two talukas throughout the year "accounts for the large amount of work done. * * * But I "think they (the two taluka vaccinators) re-vaccinated a consider-"able number, quite unnecessarily, of children under 10 years of "age." This is a difficult point to settle. In presence of small-pox I would not discourage a parent from re-vaccinating his child at any age, provided the primary vaccination had taken place at least

Table No. VI.

Sind	87,092
Presidency	17,027
Southern	3,425
Central	3,317
Eastern Guzerat	2,191
Western do.	2,152
Native Army...	1,652
Western	678
Cutch	83
Aden	72
Baroda...	25
Total re-vaccinations...	117,714

3 years previously; but if the vaccine marks be not good, I think a child in the presence of small-pox is all the safer for being re-vaccinated. In Bombay city the desire for re-vaccination during the epidemic became very great, especially among the European and Parsi communities. Mr. Ananta Chandroba says that children were brought to be re-vaccinated who had been vaccinated only 6 months before, and whose good marks plainly showed the protection was complete. The strain on the establishment was very heavy, as may be readily understood when I mention that the crews of 58 ships in harbour, the employés in 27 public offices and work-shops, the residents in 5 hotels, the clerks, peons, and coolies in 32 private offices and banks, and the scholars in 14 schools and colleges were re-vaccinated. If the work had been done at public vaccine stations, it would have given little or no trouble; but it was done at the dockyard, at public and private offices, schools, &c., and caused an immense amount of hard work to the establishment. I think Mr. Ananta Chandroba deserves the thanks of Government for the excellent manner he has carried on his duties during the epidemic, for the zeal he has displayed, and for the great labour he has undergone in meeting the demands of an alarmed community. Mr. Ananta Chandroba speaks very highly of the exertions of his Head Vaccinator, Sadasheo Balshet, and of the rest of his establishment, who did their very utmost from early morning till evening every day—not excepting Sundays—to vaccinate the crowds who sought their services.

There were re-vaccinations, to the extent of 1,488, performed in the jails of Kurrachee, Shikarpur, Aden, and in H. M.'s 29th Regiment N. I.; but, as I am not sure whether they were returned in the regular monthly returns, I have excluded them from the tables. The success was 82·3.

16. The sex, caste, and age are not recorded for re-vaccinations; my remarks on those heads, therefore, will only have reference to primary vaccinations. The returns for the British troops are excluded.

17. There were 357,847 males to 331,967 females; in percentages 51·87 to 48·13, or a disparity of only 3·74, which is 1·22 less than in the preceding year. This is very satisfactory, but the table here shows there is still a considerable disparity in Sind, though nothing like as high as in the preceding year, when it was 13·94. Dr. Williams says, with reference to this, that he called on the vaccinators to record the sexes with greater care. Aden again stands very high, but shows only half the disparity of last year. Dr. Hay, who sent in the report for Aden, thinks there

Sex.

Table No. VII.

	Males.	Females.	Excess of Males.
Aden	64·36	35·64	28·72
Presidency	58·41	41·59	16·82
Baroda	53·99	46·01	7·98
Sind	53·85	46·15	7·70
Dispensaries	52·88	47·12	5·76
Cutch	52·04	47·96	4·08
Native Army	51·86	48·14	3·72
Eastern Guzerat ...	51·76	48·24	3·52
Western do. ...	51·56	48·44	3·12
Southern	51·33	48·67	2·66
Central	50·63	49·37	1·26
Western	50·61	49·39	1·22

is some objection to vaccinate grown-up girls, while there is none for boys. The disparity in the Western Circle is very small, and Dr. Cody says in some talukas the females exceed the males in his returns. The disparity in the Presidency Circle is due to the epidemic causing many more adult males to seek vaccination than grown-up girls, who cannot go out in public so easily as their brothers.

Caste.

18. There were primarily vaccinated 4,094 Christians, 535,230 Hindus, 100,110 Musalmans, 2,848 Parsis, and 47,532 of other castes. The percentages on the total are :—for Christians ·59, Hindus 77·59, Musalmans 14·51, Parsis ·41, and 6·90 for other castes. As compared with the preceding year, there is an increase of 771 Christians, which is almost entirely in the Presidency Circle. There is a large increase in Hindus, a considerable decrease in Musalmans, chiefly noticed in Sind. The number of Parsis is fully double the number in the previous report, owing to the epidemic of small-pox in Bombay having aroused this section of the community to a sense of imminent danger.

Age.

19. There were 317,414 infants vaccinated under one year old and 372,400 persons above that age. In percentages 46·01 to 53·99. The increase in the infantile vaccinations is 22,573 over the year 1874-75, and the percentage is also higher by about 3. This is very satisfactory.

Percentages of infantile vaccinations.

20. In this table is shown the percentages of infantile vaccinations in each circle. The increase over 1874-75 is distributed through several circles ; in the Presidency and Baroda circles and also in dispensaries there was some decrease in the relative number of infants to persons above one year old. The native army again stands highest, which is owing to all children in the lines of regiments being vaccinated under compulsion to a certain extent. On the whole the progress of infantile vaccinations is everywhere very good, except in Aden, where there are, no doubt, special reasons for those above one year being so much greater than infants.

Table No. VIII.

In the Native Army	83·3
„ Presidency Circle ...	55·2
„ Eastern Guzerat do. ...	51·1
„ Dispensaries	51·0
„ Western Guzerat Circle	50·9
„ Sind Circle	50·6
„ Western Circle	47·0
„ Central „	44·1
„ Baroda „	37·4
„ Cutch „	37·1
„ Southern „	36·0
„ Aden	17·5

Result.

21. The British army returns make no distinction between primary and re-vaccinations ; and, as they do not return unsuccessful cases, I will exclude them altogether from my remarks on the results of the operations. The table below shows the percentage of success in all circles :—

Table No. IX.

	In primary vaccinations.		In re-vaccinations.	
Sind...	98·7		89·5	
Central	98·3		80·6	
Eastern Guzerat ...	97·8		75·5	
Southern	97·4		61·4	
Western	96·6		64·0	
Western Guzerat	96·6	Average 97·0	79·6	Average 85·2.
Baroda	93·5		86·3	
Dispensaries ...	93·3		77·9	
Cutch	93·0		72·7	
Presidency	92·9		74·5	
Aden	91·9		72·7	
Native Army ...	91·2		64·1	

In primary vaccinations Sind circle stands first, but the difference in the first six circles is very small. I am afraid the percentage in re-vaccinations cannot be considered of much value, as it is difficult often to say whether the result in a re-vaccination should be considered successful or not. Very few of the re-vaccinations which I have seen, have been successful in the sense of having well-shaped vesicles, and running the course a primary vaccination does; but in most cases which are reckoned successful a kind of vesicle was formed, and the course of it was irregular, generally maturing much quicker than in primary vaccination.

22. I here show the result by establishments :—

Table No. X.

		Primary vaccinations.		Re-vaccinations.
1st, 2	Government civil vaccinators obtained	97·7	...	50·9
2nd, 50	Municipal do. do.	95·7	...	76·4
3rd, 207	Local Fund do. do.	97·8	...	88·4
4th, 130	Native States do. do.	96·3	...	75·3
5th,	In the Dispensary returns	93·3	...	77·9
6th,	In the Native Army	91·2	...	64·1

The local fund establishment and the 2 Government vaccinators stand highest in primary vaccination, and the native army lowest, which is owing to some of the vaccinations having been done from tube lymph; but those who are unsuccessfully vaccinated in the army are operated on again until success is obtained in nearly all cases.

23. Table No. XI. shows the number of successful primary vaccinations were 660,556 in a population of 25,167,234, or 26·2 per mille, which is 0·9 higher than in the preceding year :— Rate per mille protected.

Table No. XI.

Circles.	Total number of persons primarily vaccinated successfully.	Populations.	Number of primary successful vaccinations per 1,000 of population.
Aden	1,716	19,289	88·9
British Army	825	13,688	60·2
Native Army	5,506	144,746	38·0
Western Guzerat	112,241	3,642,969	30·7
Sind...	65,954	2,328,765	28·3
Central	135,892	4,866,162	27·9
Presidency...	17,166	644,405	26·6
Eastern Guzerat	83,906	3,147,853	26·6
Western	80,881	3,109,370	26·0
Southern	116.985	4,762,457	24·5
Baroda	34,770	2,000,225	17·3
Cutch	4,714	487,305	9·6
	660,556	25,167,234	26·2

In British territory there were 27·1 per mille of population successfully vaccinated during the year, and in native states 24·4. These figures show an increase of 0·2 and 2·1 respectively as compared with those of 1874-75.

Lymph.

24. No lymph was received from England during the past year. That in use has been generally reported as good and efficient. In the Presidency circle animal lymph was chiefly used, and it was of good quality; but at the beginning of the epidemic of small-pox it was difficult to get enough of calves to supply sufficient lymph to vaccinate the crowds of people who flocked to the vaccine stations. Mr. Pedder and Dr. Weir promptly stepped in with their aid, and supplied as many calves as were necessary by purchasing them at the slaughter-house. I trust Government will be pleased to acknowledge this aid. In the Central and Western circles the lymph was everywhere good throughout the year. In the Southern, Eastern Guzerat, and Western Guzerat circles it was generally good, but in some instances it had to be renewed. In Sind circle it was better than usual. In Cutch it was generally good, but was renewed in October by lymph sent from Kattywar by Dr. Blomfield. I need only add that, whenever the lymph of a vaccinator is in an unsatisfactory state, it is immediately replaced by virus of unquestionable quality.

English lymph; annual supply desirable.

25. I regret that the annual two supplies of English lymph were not received, because it is a good thing to have new lymph at the beginning of the cold season to replace any which may have deteriorated. I would beg to suggest that Government call the attention of Her Majesty's Secretary of State for India to the omission of the annual supplies last November and January, and

that a request be made to continue them ; and, if possible, each of the two supplies should contain 45 tubes, which would enable me to distribute 5 to each superintendent. They should be despatched from England in October and November.

Animal vaccination.

26. Animal vaccination was practised throughout the year in the city of Bombay, and the lymph taken from the calves produced excellent vesicles in children ; but I regret to observe the resulting percentage of success is 2·1 lower than in the preceding year, which is accounted for by the percentage of success falling to 88·93 in February, when the epidemic of small-pox was causing people to crowd to the vaccine stations, and the supply of calves was then insufficient. I drew the superintendent's attention to the probability of the vaccinators being induced, by entreating crowds of people, to vaccinate too many persons from one vesicle, and told him to guard carefully against this ; but the figures show that the pressure caused, to some extent, what I feared. In March the percentage rose to 91·06, when the calves were sufficient in number to supply any amount of demands for vaccination. Mr. Ananta Chandroba says in his report :—" Animal vaccination continues to " be in a satisfactory condition. Owing to the terrible epidemic of " small-pox we have had, the number of applicants for vaccination " was unprecedentedly large. The number of heifers inoculated " during the year was 372, and 11 only were unsuccessful, as " shown in the following figures :—

Table No. XII.

	April 1875.	May.	June.	July.	August.	September.	October.	November.	December.	January 1876.	February.	March.	Total.
Heifers inoculated	21	23	24	26	24	22	21	20	25	28	52	86	372
Operations successful..	18	20	24	25	22	21	21	20	25	27	52	86	361
Do. unsuccessful	3	3	..	1	2	1	..	..	..	1	..	..	11

" Of 19,259 primary operations, 16,853 were performed with " lymph taken from the calves, and the result gave 92·65 per cent. of " success. All the re-vaccinations, except 11, were also done from " animal lymph." Animal vaccination has also been practised in Poona with much benefit in the way of supplying good and pure lymph. In Bársi animal vaccination ceased in December for want of funds, but I did not regret it much, because there the percentage of success has always been very low, much lower than from human lymph.

Supplies from Belgium of cow-lymph.

27. Cow-lymph from Belgium was received several times during the year, and part of the lymph proved successful here in the calves.

Expenditure.

28. The total expenditure was Rs. 2,22,802, or an increase of Rs. 2,138 over the preceding year. The following table shows the sums expended by each establishment:—

Table No. XIII.

Establishments.	Total expenditure.		Compared with the preceding year.	
	1875-76.	1874-75.	Increase.	Decrease.
	Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
Imperial	1,05,570 5 7	1,07,444 12 3	.....	1,874 6 8
Municipal	16,123 2 5	15,686 14 0	436 4 5	.....
Local Fund	60,685 10 11	59,753 8 11	932 2 0	.....
Native Chiefs ...	40,422 14 9	37,778 2 7	2,644 12 2	.....
Total...	2,22,802 1 8	2,20,663 5 9	4,013 2 7	1,874 6 8
		Deduct Decrease, Rs....	1,874 6 8	
		Net Increase, Rs....	2,138 11 11	

Decrease of Expenditure.

29. The decrease in the Government expenditure is owing to my having held charge of the Central Circle in addition to my own office of Superintendent General: had there been a superintendent in that circle, there would have been an increase of about Rs. 9,000 instead of this decrease.

Increase of Expenditure.

30. The increased expenditure is highest in native states' establishment, and is chiefly due to an increase of 1 vaccinator and 3 peons. The increase in municipal expenditure is chiefly due to the cost of the extra calves purchased during the epidemic of small-pox in the city of Bombay.

A fair share of expenditure should be debited to general sanitation.

31. I am of opinion that a portion of the pay and allowances of superintendents and assistant superintendents of vaccination of circles should be debited to general sanitation, because these officers are now health officers in their circles. Unless this be done, vaccination will appear to cost more than it really does, and Bombay Presidency will compare unfavourably with other provinces.

32. In the table below I show the cost of each successful vaccination after excluding the pay of the superintendents:—

Table No. XIV.

Name of Circle.	Name of Superintendent.	Successfully vaccinated and re-vaccinated.	Total cost excluding pay of superintendents.	Average cost of each successful vaccination.	Number of vaccinators.
			Rs. a. p.	Rs. a. p.	
1. Presidency ...	Dr. AnantáChandrobá	28,336	7,688 11 1	0 4 4	16
2. Central ...	Dr. J. Pinkerton ...	135,148	26,470 5 7	0 3 1	63
3. Southern ..	Dr. Raby	115,777	29,074 7 9	0 4 0	74
4. Western ...	Dr. Cody	78,258	23,407 4 5	0 4 9	51
5. Eastern Guzerat.	Dr. Colah	81,055	20,770 13 8	0 4 1	46
6. Western do.	Dr. Blomfield... ...	110,916	25,240 8 11	0 3 7	54
7. Sind	Dr. Williams... ...	135,972	24,659 10 8	0 2 10	49
8. Baroda ...	Dr. Aitkins	34,789	7,326 6 1	0 3 4	23
9. Cutch... ...	Dr. Dorábji Hormasji.	4,770	3,258 1 10	0 10 11	12
Aden	Dr. Hay	1,764	216 0 0	0 1 11	1
	Total...	726,785	1,68,112 6 0	0 3 8	389

As compared with 1874-75 there is a reduction, on the whole, of 3 pies. In the Presidency and Cutch circles the reduction is most marked, being from annas 8-9 to 4-4 in the former and from 14-8 to 10-11 in the latter. In the Central circle there is a decrease of 4 pies, in the Southern 3 pies, in Sind 5 pies, in Baroda 10 pies, and in Aden annas 2-3. The Western and Western Guzerat circles remain the same as in 1874-75, and there is an increase in Eastern Guzerat circle of 2 pies. The great decrease in the cost of each successful case in the Presidency circle is owing to the increase in the number of persons vaccinated during the epidemic, and in Cutch it appears to be due to better arrangements and extension of vaccination in that province.

Average cost of each successful vaccination.

33. The average cost of each successful vaccination, including all charges, was annas 4-11, or 5 pies less than in the preceding year, which is entirely owing to the extension of vaccination. Seven pence farthing is a very moderate cost for each successful vaccination.

Table No. XV.

	1875-76. Rs. a. p.	1874-75. Rs. a. p.
Government	0 1 9	.....
Municipal	0 3 7	0 4 7
Local Fund	0 2 2	0 2 4
Native States	0 3 0	0 3 1

34. The cost of each successful vaccination by establishments was less in all than in the preceding year, as shown in this table.

Inspections.

35. The following table shows the travelling and inspections of superintendents of circles :—

Table No. XVI.

Name of Circle.	Name of Superintendent.	Number of encampments.	Number of travelling days.	Distance travelled in miles.	Number of villages visited.	Number of vaccinated children inspected.
1. Central ...	Dr. Pinkerton ...	66	83	1,671	221	10,156
2. Southern ...	Dr. Raby ...	55	83	942	121	5,628
3. Western ...	Dr. Cody ...	71	135	2,515	308	8,013
4. Eastern Guzerat.	Dr. Colah ...	70	187	2,082	505	13,208
5. Western do.	Dr. Blomfield ...	49	122	1,237	238	15,968
6. Sind	Dr. Williams ...	93	120	2,907	378	6,406
	Total...	404	730	11,354	1,771	59,379

Although the number of children inspected is less than in the preceding year, still I think each superintendent has seen sufficient children to test thoroughly the work of his vaccinators. Dr. Williams in Sind has again the greatest number of encampments; Dr. Cody stands next. Dr. Colah has again the greatest number of travelling days. Drs. Williams and Cody have the highest mileage. Dr. Colah inspected the greatest number of villages, and Dr. Blomfield the greatest number of children, but Dr. Colah stands very close to him.

Names tested in registers.

36. The following table shows the number of children inspected by calling the names from the vaccinators' registers :—

Table No. XVII.

Circles.	Work tested by calling names from registers.									
	Present during inspection.			Absent during inspection.		Number of persons whom the vaccinator has returned as vaccinated.				
	Successful.		Unsuccessful, including bad.	Absence accounted for.	Absence unaccounted for.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	Excess of operations over Persons.
	Good.	Middling.								
1. Central	8,748	605	495	4,117	...	13,517	247	211	13,975	10
2. Southern	2,716	231	184	2,608	...	5,260	218	211	5,689	...
3. Western	7,094	461	314	2,914	...	10,206	344	233	10,783	..
4. Eastern Guzerat ...	4,653	6,444	1,279	3,073	...	14,854	448	147	15,449	...
5. Western do. ...	3,457	1,027	725	2,691	95	7,358	433	204	7,995	...
6. Sind	602	2,665	3,113	2,555	...	8,116	393	426	8,935	...
Total...	27,270	11,433	6,060	17,958	95	59,311	2,083	1,432	62,826	10

Dr. Colah again stands first, but Dr. Cody also stands high, and the lowest figure is 5,689—a number quite sufficient for the object in view, and I would rather deprecate excessive inspections on the part of the superintendents, as the assistant superintendents do this duty so well. Speaking for myself, I think about four-fifths of my inspections in the Central circle consisted of seeing the children who had already been inspected by the assistant superintendents, and I found their inspections had been as faithfully done and as carefully reported as I could do them myself. These inspections cause the people some trouble and loss of time: so I think we need not carry them further than is necessary to test the work of the vaccinators and the returns of the assistant superintendents. I am of opinion that if superintendents arrange their inspections judiciously they need not trouble parents more than to the extent of seeing about three or four thousand vaccinated children a year. I do not mean to lay this down as an absolute rule, because there may be occasions requiring a superintendent to inspect more, but, speaking generally, I think the work of any circle can be very satisfactorily tested by the superintendent himself seeing about 3,000 vaccinated children, provided he sees them in as great an area as at present.

Commendation of superintendents.

37. The superintendents during the past year have carried on their duties to my entire satisfaction. As regards primary vaccination there is progress in all circles except Sind and Eastern Guzerat, where there have been decreases to a small extent, compensated in the former by a large increase in re-vaccinations. The officers of the department have all done their duty so well that I can hardly name one as more deserving of commendation than another. Both Drs. Williams and Cody have their circles in first-rate order. Dr. Raby has marked progress by an increase of 13,984 vaccinations in the Southern circle, and gives promise of a still further increase. In the Presidency circle Mr. Ananta Chandroba used his best endeavours to meet the epidemic, and spared himself no pains in this trying time. In Kattywar Dr. Blomfield has been most active in trying to suppress falsification of his vaccinators' returns; and, as a punishment and warning to others, the most culpable have been dismissed the service. I am also very much pleased to notice the efforts of Dr. Dorábji Hormasji, H. H. the Rao of Cutch's medical officer, to improve the state of vaccination in that province.

Work of assistant superintendents.

38. There are 30 assistant superintendents—27 paid by Government and 3 by native states. Their conduct, on the whole, has been good, and they have worked zealously and well. The exceptions are one in Kattywar and another in the Southern circle. They inspected 11,267 villages, in which they tested the records and results to the extent of 332,841 names in the vaccinators' registers, and of these they actually saw the vesicles or marks of 274,265 persons.

Total inspections.

39. Taking the inspections of superintendents and their assistants together, there were 13,038 villages and 395,657 vaccinated persons inspected. This is nearly 50 per cent. of the work

of the year, excluding the army vaccinations, which are performed under the supervision of the regimental medical officers.

12 Vaccinators dismissed for falsifying registers.

40. The inspections show that the vaccinators' registers are, on the whole, very satisfactorily kept. But I regret to notice there were 2 vaccinators in British territory dismissed for falsification, one in Sind and one in the Southern circle. In Native states 8 were dismissed in Kattywar for this crime, 1 in Cutch, and a third in Kolhápur. So 12 vaccinators were dismissed for falsification.

Conduct of vaccinators.

41. Speaking generally the conduct of the vaccinators has been satisfactory. In the Central circle the conduct of the vaccinators was very good; Drs. Cody and Colah say the same of those in their circles. Dr. Blomfield dismissed altogether 11 vaccinators, and fined 22 for various faults. The fines ranged from Re. 1 to Rs. 30; several were fined as much as Rs. 15. Considering the pay of a vaccinator is small, it seems to me these fines are excessive in amount. However, I hope the conduct of the vaccinators in Dr. Blomfield's circle will now be improved. In Kattywar harsh measures were necessary to put down falsification, and the dismissals had my hearty approval; but I am doubtful about the good effect of inflicting very heavy fines on men drawing such small pay as vaccinators.

Inoculation.

42. Inoculation is said to be practised in Cutch by 2 men when small-pox prevails, and I regret to say I have had information of it being also carried on by 2 inoculators in Ratnágiri Zillah. I at once communicated with the Collector, but have not since heard from him. The vaccinator of Dápuli taluka reported that the police patel of the village of Wágra had 4 of his own children inoculated with small-pox virus, and that 57 other children of the village were also inoculated. I think Government should make an example of this patel, if the Collector have not already done so. I have not heard of this baneful practice being pursued in any of the other circles. Mr. Larcom, the Political Agent at Janjira, informs me that H. H. the Nawab has forbidden the practice of inoculation since the introduction of vaccination. I think the time has now arrived when Government might forbid its practice in British territory, as there is now means everywhere for people to be vaccinated. A proclamation would be sufficient.

Vaccino-syphilis.

43. In no instance has syphilis been known to be communicated by vaccination, nor has any other ill-effect been observed.

Small-pox.

44. The returns of small-pox which I receive from the Sanitary Commissioner are for the calendar year. The total number registered, is 3,545, but in addition to these there were 54 deaths in Aden, 1 in the British army, and 9 in the Native army: total 3,609. This is 298 fewer deaths than in preceding year. I again state my opinion that the returns of deaths from small-pox are not of any exact value, because in Western India deaths from measles are often recorded as from small-pox. The calendar year 1875 was, as regards small-pox, a non-epidemic one, but towards

the end of that year small-pox began to assume greater activity, and in January it burst out into an epidemic of unprecedented virulence in the city of Bombay, whence it has spread to the Konkan and Deccan districts.

Small-pox in Central circle.

45. In the Central circle the deaths from small-pox were 368, or 204 less than in 1874-75.

Small-pox in Southern circle.

46. In the Southern circle 1,406 deaths are recorded, or 186 less than in the preceding year.

Small-pox in Western circle.

47. In the Western circle the deaths were 420, or 169 of a decrease as compared with the preceding year. Dr. Cody says:— "The small-pox registration is on a par with that of the other "vital statistics, and all are so imperfectly kept as to be alto- "gether misleading."

Small-pox in Eastern Guzerat circle.

48. In Dr. Colah's circle there were 880 deaths to 473 of the previous year. In October I issued a circular to superintendents calling their attention to the circumstance that small-pox appeared to be acquiring more activity, and requesting them to push vaccination wherever the disease appeared to be gaining ground. On the receipt of my circular, Dr. Colah instituted enquiries in the zillahs of Surat and Kaira as to the correctness of the returns of deaths from small-pox, and in the following table he shows that out of 702 deaths said to be from small-pox only 86 could be made out to be for certain from that disease; while 328 were from measles, 70 from fever, 100 from other diseases, 10 said to be dead of small-pox were actually living, and 108 could not be traced. This requires no commentary from me.

Table No. XVIII.

Names of talukas.	Number of villages.	Number of deaths from small-pox in mámlatdárs' returns.	Of these found on inquiry to have died from					Not traceable on inquiry.
			Small-pox.	Measles.	Fever.	Other diseases.	Not died but living.	
Surat Collectorate.								
Mándvi	2	7	7	...	...	...	...	...
Bárdoli	5	8	7	...	...	1	...	...
Olpád	9	55	18	2	1	4	...	30
Chorási	5	6	4	1	1	...	...	...
Jalálpur	4	5	...	1	2	2	...	...
Chikhli	3	5	3	...	2	...	...	...
Bulsar	3	4	...	3	1	...	...	...
Párdi	...	...	...	...	...	...	...	...
Surat City	1	70	18	17	8	7	...	20
Randir Town	1	35	18	3	1	2	...	11
Bulsar Town	1	13	...	6	3	2	...	2
Total...	34	208	75	33	19	18	...	63

Table No. XVIII.—continued.

Names of talukas.	Number of villages.	Number of deaths from small-pox in mámlatdárs' returns.	Of these found on inquiry to have died from					Not traceable on inquiry.
			Small-pox.	Measles.	Fever.	Other diseases.	Not died but living.	
Kaira Collectorate.								
Mehmadabad	7	12	...	8	1	2	...	1
Mátar	11	52	...	35	6	7	...	4
Kapadwanj	2	6	3	1	2	...	...	...
Thásra	5	11	...	8	...	2	...	1
Nariád	18	129	1	60	15	38	1	14
A'nand	29	146	5	111	16	7	...	7
Borsad	24	138	2	72	11	26	9	18
Total...	96	494	11	295	51	82	10	45

Small-pox in Western Guzerat circle.

49. In Western Guzerat circle, Ahmedabad is the only British zillah, and in it only is there registration. There were 177 deaths to 388 in 1874-75, or a decrease of 211. Dr. Blomfield reports that "small-pox did not prevail as an epidemic, except in the Lilia "mahal of Kundla, where it commenced in February, and has "continued to the end of the official year."

Small-pox in Sind circle.

50. In Sind there were 48 deaths recorded by the Sanitary Commissioner to 31 in 1874-75. Dr. Williams says he has received information, from his assistants and vaccinators, of 90 deaths among 447 cases, or 22·4 per cent. of deaths to attacks, which is not half as high as in the city of Bombay, and just little over half the percentage in Aden.

Small-pox in Cutch.

51. In Cutch Dr. Dorabji Hormasji says :—"Small-pox is "not much heard of this year; only a few solitary cases were re-"ported by the vaccinators."

Small-pox in Aden.

52. In Aden, Dr. Hay states, "157 cases of small-pox were "treated during the year: all, with a few exceptions, occurred "during the last three and half months of the official year." 13 were imported, and the rest occurred in Aden. Vagrants were the greatest sufferers. The deaths were 54, or 41 per cent. of attacks. Dr. Hay is of opinion the disease was originally imported from Jeddah. 36 of the attacked had been vaccinated, and 3 had suffered from the disease before.

Small-pox in Presidency circle.

53. In the Presidency circle, *i.e.* Bombay city, the deaths during the calendar year were only 246, or 12 fewer than in the year 1874. This is the smallest number of deaths since 1862, and only in 3 years in the last 26 have there been smaller numbers. Through the courtesy of Dr. Weir, the Health Officer of Bombay city, I have returns of deaths till the 30th of April 1876. In these first four months of the year, 2,717 deaths occurred among 5,870

cases of small-pox; this is 46·2 per cent. of deaths to attacks. Mr. Ananta Chandroba in his report says:—" The past year has been " remarkable on account of the epidemic of small-pox that prevail- " ed during the last three months of the official year, and which has " not yet (17th May 1876) died out. It is remarkable not so much " on account of its extent, for some 5,000 cases only were reported, " but rather on account of the suddenness of its advent, rapid spread " over the city, virulence, and fatality. Indeed, such virulent " small-pox has not been seen in the memory of man. In the course " of January, February, and March 1876, 2,062 persons fell victims. " During the first few months of the official year 1875-76 measles " were very prevalent, and caused a considerable mortality; and it " was found on enquiry that not a few of the deaths from measles " had been recorded as from small-pox. The following table " shows the small-pox deaths by months as recorded by the Health " Officer of the city of Bombay:—

Table No. XIX.

April 1875.	May.	June	July.	August.	September.	October.	November.	December.	January 1876.	February.	March.	Total.
36	32	25	24	11	6	4	10	39	200	646	1,216	2,249

" There was also another circumstance which struck many with " terror, and that was a belief that there were many persons attack- " ed by the disease who had been vaccinated in infancy, or were " protected by a previous attack of the disease. How far this " belief had any support by facts, I am unable to say, but I have " not myself seen a single instance of small-pox in a person pre- " viously protected by an attack of the disease. I know from per- " sonal experience that people here are very apt to confound small- " pox with chicken-pox, and persons having an attack of the latter " are credited with having the former. That people protected by " vaccination did get small-pox cannot be doubted, though the num- " ber of such cases have been very small indeed. That Europeans " and foreigners showed great predisposition to the disease, is " also a fact; and strangely, too, there was a high rate of mortality " among them. It was these circumstances which caused the Euro- " pean community to be re-vaccinated in such numbers. I do " not know of a single instance of small-pox in an European child " who had been successfully vaccinated in Bombay."

54. With the view of obtaining precise information about the epidemic of small-pox in the city of Bombay, I have addressed the following letter to all practitioners and medical officers in the city, No. 169 of 1876-77, dated Bombay, 1st May 1876:—"Sir,— It is very desirable the profession and the public should know

how far vaccination and re-vaccination have afforded protection from death by small-pox in the present epidemic in the city of Bombay. I, therefore, take the liberty of asking you, for the public good and in the interest of science, to kindly fill up, in the form on the back of this letter, the particulars of cases of small-pox which have come under your cognizance as far as you can, and return the form to me after the lst July next, by which time I hope the epidemic will have completely ceased.—I have, &c."

Table No. XX.

Showing the particulars as regards the protection and non-protection in cases of small-pox in the present epidemic; also the ages of the persons attacked by small-pox; the number of cases and deaths in each class.

Classification.	Number of cases in each class.	Number of deaths in each class.
1*st.*—Unvaccinated		
2*nd.*—Stated to be vaccinated, but having no cicatrix		
3*rd.*—Vaccinated—		
(*a*).—Having 1 vaccine cicatrix ...		
(*b*).— „ 2 „ cicatrices ...		
(*c*).— „ 3 „ „ ...		
(*d*).— „ 4 „ „ ...		
(*e*).— „ 5 „ „ ...		
(*f*).— „ 6 or more „ ...		
A. Having well-marked cicatrices ...		
B. „ badly-marked „ ...		
C. Re-vaccinated		
4*th.*—Having previously had small-pox ...		
5*th.*—Ages—		
(*a*).—Under 1 year old		
(*b*).—From 2 to 6 years old		
(*c*).— „ 7 to 12 „ „		
(*d*).—Above 12 „ „		

If I can make anything of the information I will submit it to Government.

Small-pox after successful vaccination or after having been protected by small-pox itself.

55. I asked superintendents to make a note of any instances of small-pox occurring after good vaccination. Dr. Cody says :—"There have been some instances reported, but I have seen none "myself—they were in every case mild." Dr. Williams says :—"There is no instance of recurrence of small-pox in any individual, but many instances of its occurrence in people who have "been inoculated with the small-pox virus, and several of them

" fatal. There are also many cases of small-pox after vaccination, " but, as a rule, of a very mild type." Dr. Dorabji Hormasji reports :—" I have not heard or seen any instances of small-pox " either after successful vaccination or previous small-pox." I have not heard of any in the Central circle. Dr. Anantá Chandobá in his report says :—

" Owing to my official position, and coming in constant " contact with hundreds of families, I have opportunities of " observation on the subject such as rarely fall to the lot " of any single professional individual; and, though I had small- " pox all about me, with hundreds of children, vaccinated by my- " self, freely mingling with the attacked, I only met with 10 " cases of small-pox supposed to be after previous successful " vaccination. Of these 10, 2 were cases of distinct genuine " small-pox, but of the most discreet kind. One was seen in a " Parsi lady 18 years old. Her father stated that she was suc- " cessfully vaccinated when an infant. I could not, however, see " any marks of vaccination. She ultimately did well. The other " case was in a Hindu lady, 16 years old. Here, too, there were " no distinct marks of vaccination; her brother, aged about 24 " years, who was also attacked at the same time with her, showed " no marks either, and still he had the disease in the varioloid " form. One case was seen in a child 5 years old whose father " is an acquaintance of mine. I had successfully vaccinated " the child 4 years ago with animal vaccine lymph. There " were beautiful marks of vaccination on the arms, and the " present attack of small-pox was of the mildest varioloid kind. " This person had two other children, one 3 years old and " the other 6 months. The 6-months' old child was vacci- " nated, and the operation was successful; and it was whilst " this case was progressing that the 5-years' old child became " attacked with small-pox, the eruption being preceded by distinct " fever of 3 days' duration. The 3rd child, 3 years old, was also " successfully vaccinated when a baby; but, seeing the other " child suffer from an attack of small-pox, I proposed, as a precau- " tionary measure, to have the child re-vaccinated. Thoroughly " orthodox in sentiments, and swayed by the women of the family, " the father would not submit the child to the operation so long as " the small-pox disease was in the house. The attack passed away " in due time; and, after taking the child to the 'Shitala Devi', " the father got the 3rd child re-vaccinated. My remark on " the occasion, however, w[illegible] that the child having passed safely " through the fiery ordeal o[illegible]stant contact with the affected child, " there was no necessity n[illegible]or the operation. The child was, " however, re-vaccinated; but the operation failed. The other " cases were of the varioloid form, and were seen in aged persons. " In none was there a fatal termination. During the course of " the past epidemic many cases, indeed, were met with of " small-pox attacking persons whilst vaccinia was progressing " in their system; but this undoubtedly was owing to the persons " having been previously infected, and the vaccination was had " recourse to when too late. It was in this way that very many " were attacked, and many valuable lives were lost. That our vac-

" cinations are sufficiently prophylactic, there cannot be the shadow " of a doubt; and eventhe death reports of the registration depart- " ment, imperfect as they are proved to be, give ample corrobor- " ation of the fact. Out of 2,272 deaths from small-pox, informa- " tion regarding previous vaccination is recorded in 1,998 cases; " and of these in only 149 instances is vaccination reported to have " been performed. The rest were not vaccinated at all. That 149 " even is not the correct figure, will be seen when it is known that " in two of these instances the children were barely 2 months " old when they were attacked with small-pox. That these were " previously vaccinated, and that too successfully, is not at all likely. " One of these 149 previously vaccinated, is reported to have died " from small-pox, the disease being only of 8 hours' duration! " How this was found out, is to me a mystery, seeing that the pre- " liminary fever itself is of 3 days' duration; and, unless the " eruption makes its appearance, nothing can be positively affirmed."

56. I will now review the work of the different establishments—

Work of the Government vaccinators.

57. The 2 Government vaccinators employed in Rájkot and Deesa vaccinated 4,763 persons, or 75 less than in 1874-75. Their percentage of success in primary is 97·7, and in re-vaccinations 50·9. The cost of each successful case was annas 1-9.

Work of municipal vaccinators.

58. The municipal vaccinators numbered 50, or 1 less than in last report—Gokák one having being abolished. They performed 81,766 vaccinations, or 21,766 more than in the preceding year, chiefly accounted for by the great increase in the Presidency circle. The increase in the other circles is slight, but in Aden there is a very great increase in the one vaccinator's work. A decrease took place in the Western Guzerat circle, chiefly noticeable in the work of the vaccinators in the towns of Dhanduka and Ahmedabad. The superintendent does not notice any reason for the decrease, but it is probably owing in the former town to there now being 2 other vaccinators in the taluka of Dhanduka, and the latter to the subjects being fewer. Each municipal vaccinator on an average operated on 1,635 persons, or 459 more than in the year preceding, or 360 below the general average; but the municipal vaccinators have a more limited sphere than the local fund vaccinators, and it is more difficult to get a busy town people to vaccinate their children than the inhabitants in rural villages. The percentage of success was 95·7 in primary vaccinations, or 0·2 less than in 1874-75. The cost of each successful vaccina-

Table No. XXI.

	Increase.	Decrease.
Presidency Circle ...	20,951	...
Central do. ...	224	...
Southern do. ...	104	...
Western do. ...	218	...
Eastern Guzerat Circle.	173	...
Western do. ...	...	1,199
Sind Circle ...	210	...
Aden do. ...	1,085	...
	22,965	1,199
Net Increase ...	21,766	

tion was annas 3-7, or 1-0 less than in the preceding year. On the whole the work of these vaccinators has been satisfactory.

59. There were 207 local fund vaccinators, or 4 more than in the preceding year—3 of an increase in Belgaum, 1 in Nasik, and 1 in Ahmedabad, but in Sind one of the vaccinators in the Upper Sind Frontier district was unemployed throughout the year. These 207 vaccinators operated on 462,320, or 34,662 more than in the preceding year. The increase is most marked in Sind, and there the increase is wholly in re-vaccinations. The best increases are in the Central and Southern circles, as shown by these figures. The decrease in the Eastern Guzerat circle is only to a small extent, but as there is some room for extension still in this circle it is to be regretted. Each vaccinator operated on 2,233 on an average, which is 238 above the average of the whole department for this year, and is 127 above their average in 1874-75. The percentage of success in primary vaccinations is 97·8, or 0·8 higher than in the previous year. Each successful vaccination cost annas 2-2, or pies 2 below the previous year. Progress is very satisfactory, but a few more vaccinators are required in Poona and Ratnágiri zillahs. Work of the local fund establishment.

Table No. XXII.

	Increase.	Decrease.
Central Circle ...	8,256	...
Southern do. ...	8,145	...
Western do. ...	3,321	...
Eastern Guzerat Circle.	...	896
Western do. ...	1,460	...
Sind Circle ...	14,376	...
	35,558	896
Net Increase ...	34,662	

60. In native states there were 130 vaccinators employed, or 1 more than in the previous year; he was appointed in Cutch. One of the 2 men in Janjira was reduced in October, so that at the close of the year the actual number was 129. They vaccinated 227,453, or 15,797 over the year preceding the one under report. The greatest increase is noticed in the Baroda circle; but there has also been considerable progress in the Southern, Western Guzerat, Central, and Cutch circles. The decreases occurred in the Sind, Western and Eastern Guzerat circles. The decrease in Sind is in primary vaccinations, and Dr. Williams considers it due to want of subjects. In the Western circle there was 1 vaccinator reduced, and in Jawhár the vaccinator was sick for some time. The decrease in the Eastern Guzerat circle is also Work of native states' vaccinators.

Table No. XXIII.

	Increase.	Decrease.
Central Circle ...	3,663	...
Southern do. ..	5,053	...
Western do. ...	...	2,383
Eastern Guzerat Circle.	...	1,950
Western do. ...	4,514	...
Sind Circle ...	...	4,152
Baroda do. ...	8,844	...
Cutch do. ...	2,208	...
	24,282	8,485
Net Increase ...	15,797	

in primary vaccinations, and is spread more or less over several of the native states of this circle. Each vaccinator operated on 1,749 persons on an average, or 109 more than in 1874-75; but this average is 246 below the general average. The percentage of success in primary vaccinations is 96·3, or 0·4 higher than in last report, and each successful case cost annas 3, or 1 pie less than in the preceding year.

Dispensary vaccination work.

61. Vaccination was carried on at 110 dispensaries by the medical subordinates in charge of them, and returns have been received from 2 jails. At these places 23,744 persons were operated on, or an increase of 2,552, and the success in primary vaccinations is 93·3 to 92·5 as compared with the preceding year. These operations cost the department nothing except lancets, forms, and postage. The percentage of success is considerably below that obtained by the itinerant vaccinators, but when the number of vaccinations is small the success must be comparatively low. The decrease in the Central circle is owing to work at the dispensaries of Ahmednagar, Khed, Bársi, Sholápur, Pandharpur, and Talegaon having been placed in the hands of the municipal vaccinators of these towns.

Table No. XXIV.

	Increase.	Decrease.
Central Circle ...	...	677
Southern do. ...	682	...
Western do. ...	563	...
Eastern Guzerat Circle	142	...
Western do. ...	144	...
Sind Circle ...	1,842	...
Muscat do. ...	...	144
	3,373	821
Net Increase ...	2,552	

Army vaccinations.

62. Army vaccination shows an increase of 1,027, but in the previous year there was a decrease of 2,074. The total number of persons operated on was 8,307.

Average number of persons vaccinated by each vaccinator.

63. The average number of persons vaccinated by each vaccinator for the whole Presidency is 1,995, or an increase of 167 over the preceding year. The average for the 4 army vaccinators cannot be given, as their work is returned in the monthly returns of regiments as well as in their own returns, but for other establishments the averages are here given. They each show an increase, except in the case of the 2 Government vaccinators.

Table No. XXV.

1st, 2 Government	Civil Vaccinators	2,381
2nd, 50 Municipal	do.	1,635
3rd, 207 Local Fund	do.	2,233
4th, 130 Native States	do.	1,749

Average number of vaccinations per vaccinator in each circle.

64. The following table shows the average number of persons vaccinated by the vaccinators in each circle and the name of the officer in charge of each :—

Table No. XXVI.

Circles.	Average number of persons vaccinated by each vaccinator.	Names of superintendents.
1. Sind	3,060	Surgeon J. Williams, M.D.
2. Presidency... ...	2,228	Mr. Anantá Chandrobá.G.G.M.C.
3. Central	2,193	Surgeon-Major J. Pinkerton, M.D.
4. Western Guzerat ...	2,188	Surgeon-Major Blomfield.
5. Aden	2,182	Surgeon Hay, M.D.
6. Eastern Guzerat ...	1,814	Dr. Colah.
7. Baroda	1,679	Surgeon-Major Atkins.
8. Southern	1,658	Surgeon Raby.
9. Western	1,607	Surgeon Cody.
10. Cutch	436	Mr. Dorabji Hormasji, G.G.M.C.

The Sind circle again stands first as compared with the preceding year; the Presidency circle has jumped from the 9th to the 2nd place; the Central circle again holds the 3rd place; Western Guzerat has fallen from the 2nd to the 4th place; Aden has risen from the 8th to the 5th place; the Western circle has fallen from the 5th to the 9th place; and Cutch is again last. The average has risen in all circles except two, viz., Eastern Guzerat and Western circles; in both the decrease is small. The very high average in Sind is due entirely to the great number of re-vaccinations.

Tours of superintendents

65. In the Central circle I went through the zillahs of Poona, Ahmednagar, and Sholápur. I intended to visit Ratnágiri and Satara, but was called into Bombay on account of the severe epidemic of small-pox. I inspected the work of all the vaccinators in the Ahmednagar zillah very carefully, and was well pleased with their work in nearly every instance. In the 3 talukas of Poona which I visited the work was also very good, and in Karmála taluka of Sholápur zillah it was fair. Dr. Raby's tour extended through Dharwar and Belgaum zillahs, in which he examined most of the vaccinators' work, and in Kanara he saw the work of 5 men. Dr. Cody visited all the zillahs in his circle, and saw work in 27 talukas. Dr. Colah went through the whole of his districts except Máhi Kánta, and saw work in nearly all talukas. Dr. Blomfield visited the 4 divisions of Kattywar, and two talukas of Ahmedabad zillah, but Pálanpur has not been visited for the last three years. Dr. Blomfield was in expectation of being relieved of his vaccination duties; had he thought it likely he should be still in charge of the Western Guzerat circle he would have made a point of visiting the Pálanpur territory last cold season. Dr. Williams went through all his districts. He says:—"I need write but a very "brief account of my tour. I marched up the right bank of "the Indus, which I crossed over from Thul in Jacobabad to "Ghotki in the Rohri districts, and then traversed the Hy-"derabad districts, and the neighbourhood of the Eastern Nara "as far as Jhooda, when I re-entered Hyderabad by Bago "Tando and Badin, and then went into the Sháhbandar and

"Jerruck divisions of the Kurrachee collectorate. On my way I "inspected the work in nearly all the talukas. I did not go to the "talukas of Jacobabad and Kashmor, as there was no work going "on in them at the time. I omitted inspecting any portion "of the work in H. H. Mir Ali Murad's territory."

Aid of civil and political officers.

66. All the superintendents, except one, acknowledge the aid they have received from the civil and political officers. Without their aid and countenance vaccination never could have made the progress it has done.

67. I will now show the progress in each district, and be as brief as possible—

Progress in Presidency circle.

68. The Presidency circle is in charge of Mr. Anantá Chandrobá. No change in the staff. There were 17,166 primary successful vaccinations, or an increase of 4,684 as compared with the preceding year. This gives 26·6 per mille of population to 19·3 in 1874-75. The number of re-vaccinations increased from 1,562 to 17,027, entirely owing to the epidemic of small-pox causing people to seek protection. The average number of persons operated on by each vaccinator is 2,228, or 1,309 above 1874-75 and 233 above the general average. The cost of each successful operation was annas 6-9 to 13-10 in 1874-75. Deaths from small-pox in the calendar year, 246, or 12 less than in previous year.

Progress in Central circle.

69. The Central circle was in my charge during the whole year. The population is 4,866,162, and the area 28,282 square miles, exclusive of the cantonments of Poona and Kirkee. There are 6 assistant superintendents, that is, one for each zillah, except Satara, which has 2. The number of the vaccinators is the same as in my previous report, viz., 63. They have each, on an average, a population of 74,767, and the 20 dispensary officers have charge of 184,252. The primary vaccinations numbered 138,496, and of these 135,892 were successful, or 98·2 per cent., which is 1 higher than in 1874-75. This gives 27·9 per mille of population successfully vaccinated during the year, or 2·4 more than in the preceding year. The re-vaccinations rose from 2,001 last year to 3,317. The average number vaccinated by each vaccinator was 2,193, or 192 more than in the preceding year and 198 above the average of the whole presidency. The cost of each successful vaccination was annas 3-3 to 4-2 in the preceding year. There were 368 deaths from small-pox, or 204 fewer than in 1874.

Poona collectorate.

70. In Poona collectorate the number of primary successful vaccinations was 23 per mille of population, or 3 more than in the preceding year. The re-vaccinations only reached the insignificant number of 388. At least 2 more local fund vaccinators are required for this zillah, because the populations of Haveli and Bhimthadi talukas are each too great for one vaccinator. By giving the Khed municipal vaccinator some villages around Khed town, the taluka vaccinator has been relieved a little. The small-pox deaths were 186, of which 113 occurred in the city of Poona; in the previous year the deaths in this zillah were 129.

71. Ahmednagar collectorate is well provided with vaccinators, and for the last few years has consequently been making more progress than the other districts of the Central circle. There were 34·3 per mille of population vaccinated. The small-pox deaths were 40, or 18 more than in the preceding year. Ahmednagar collectorate.

72. Sholápur collectorate had too few vaccinators, but one was added during the year, and another has been sanctioned, and will be appointed on 1st March next. The successful vaccinations have risen from 25·5 per mille in 1874-75 to 28·9. The deaths from small-pox were 19, or 10 fewer than in 1874. Sholápur collectorate.

73. The Satara collectorate had 12 vaccinators, but 2 more were appointed at the beginning of the year 1876-77. 27·6 per mille of population were successfully vaccinated, or 0·3 more than in 1874-75. The deaths from small-pox were 20, or 51 less than in 1874. Satara collectorate.

74. Ratnágiri collectorate has too few vaccinators for the population, and at least 3 more are required. There were 26·6 per mille of population successfully vaccinated, or 0·7 fewer than in 1874-75. Each vaccinator vaccinated on an average 2,675, which is the highest average of the circle. The talukas of Ratnágiri, Deogad, and Dápoli each require a second vaccinator, which has been represented to the president of the local fund committee. The deaths from small-pox were 103, or 218 less than in 1874. Ratnágiri collectorate.

75. The native states in the Central circle are making progress: there were 28·3 successful primary vaccinations per mille as compared with 19·1 in the preceding year. Native States in Central circle.

76. The Southern circle is in charge of Surgeon Raby. He has 5 assistant superintendents and 74 vaccinators, or 2 more than shown in last report. The population in charge of these vaccinators is 4,601,407: so each has, on an average, 62,181. The primary successful vaccinations were 116,985, or 24·6 per mille of population, which is 2·9 more than in 1874-75. The re-vaccinations numbered 3,425, or an increase of 615 as compared with the preceding year. The cost of each successful case was 5 annas, or less by 4 pies than in the previous year. Each vaccinator on an average operated on 1,658, or 138 more than in 1874-75, but still 337 below the general average. This circle is making progress. The deaths from small-pox were 1,406, or 186 less than in 1874. Progress in the Southern circle.

77. Belgaum collectorate had 2 more vaccinators than in 1874-75. There are 12 vaccinators altogether, and each has an average population of 76,212. The municipal vaccinator of Gokák was abolished in May 1875 for want of funds, and the dispensary officer has now charge of the town. The successful primary vaccinations were 22,464, or 23·9 per mille of population, or an increase of 7·5. This is very satisfactory, and a further increase may be expected. The deaths from small-pox were 693 to 537 in the previous year. Belgaum collectorate.

Dharwar collectorate.

78. Dharwar collectorate.—No change in the number of vaccinators. There were 20·7 only per mille of population vaccinated—an increase of only 0·5 over the previous year. Progress in this zillah is slow, but it would be injudicious to unduly press the unwilling Lingayats. Deaths from small-pox 238 to 485 in 1874.

Kaládgi collectorate.

79. Kaládgi collectorate shows some progress: there were 25·4 per mille of population vaccinated successfully to 21·5 in 1874-75. There were 338 deaths from small-pox, or 52 more than in the previous year.

Kanara collectorate.

80. Kanara collectorate has in proportion to population the greatest number of vaccinators of all the zillahs. The successful vaccinations were 35·9 per mille of population, or a decrease of 4·4; owing to several changes among the vaccinators, the new hands did not do as much work as the old ones. There were only 137 deaths from small-pox, or 147 less than in 1874.

Native States in Southern circle.

81. The native states in this circle are Kolhápur, Sáwant Wári, and the Southern Marátha States. There was no change in the number of vaccinators. There were 38,958 successful primary vaccinations, giving 24 per mille of population. Progress in these states is very good.

Progress in the Western circle.

82. The Western circle is in charge of Surgeon Cody. He has 5 assistant superintendents, and 51 vaccinators were at work for the first half of the year and 50 in the latter half. They have each, on an average, 57,287 of population, and the dispensary officers take charge of 187,693 of a population. The successful primary vaccinations were 80,881, and the rate per mille 26, or 1·2 more than in the previous year. There were only 678 re-vaccinations. Each vaccinator on an average operated on 1,607, or 9 less than in 1874-75 and 388 below the general average. The cost of each successful vaccination was annas 6-3, or 1-4 above the general average. The deaths from small-pox were 420, or 169 less than in 1874.

Tanna collectorate.

83. Tanna collectorate.—No change in the staff. The number of persons primarily vaccinated successfully was 21,301, or 25·1 per mille of population, being 3·3 of an increase over last year. The re-vaccinations have risen from 88 in 1874-75 to 220. Each vaccinator's average is 1,632, or 201 above the preceding year, but 363 below the general average. The deaths from small-pox were 286, or 28 above the number in 1874.

Colába collectorate.

84. In Colába collectorate there were 24·8 per mille of population successfully vaccinated, or an increase of 2·7 over 1874-75. The deaths from small-pox were 73, or 77 fewer than in the previous year.

Násik collectorate.

85. Násik collectorate had 1 more vaccinator than in the previous year. He was appointed for the new taluka of Kalwan,

so there are now 12 vaccinators in this zillah ; each has an average area of 598 square miles and 53,919 of population. The primary successful vaccinations were 17,899, or 26 per mille of population, being an increase of 3 as compared with the preceding year. Each vaccinator's average was 1,547, or 38 below the preceding year. The deaths from small-pox were 39, or 8 less than in 1874.

Khandesh collectorate.

86. In Khandesh collectorate the number of vaccinators remain as in 1874-75. The vaccinations numbered 27,906 successful, or 27·1 per mille of population, which is exactly the same number as in the preceding year. Only 22 persons are returned as died of small-pox, or 111 fewer than in 1874.

Native States in the Western circle.

87. The native states in this circle are Jawhár, Janjira, and Peint. The number of vaccinators was reduced by 1 in Janjira. There were 25·8 per mille successfully vaccinated. Progress is satisfactory.

Progress in the Eastern Guzerat circle.

88. Dr. Colah is superintendent of Eastern Guzerat circle. There has been no change in the number of vaccinators. The primary successful vaccinations were 83,906, or 26·6 per mille of population. Re-vaccinations numbered 2,191, or a slight increase over the preceding year. Each vaccinator averaged 1,814, or 58 fewer than last year. The percentage of success in primary vaccinations was 97·8—a slight improvement on the preceding year. The cost of each successful case was annas 5-1, or 2 pies of an increase as compared with 1874-75 and 2 pies above the general average. The deaths from small-pox are 880, or 407 above the figures of 1874; but it is known the returns include many deaths from measles.

Surat collectorate.

89. In Surat collectorate there have been no changes in the staff. There were 24·3 per mille of the population successfully vaccinated, or a decrease of 1·6 as compared with the preceding year. The deaths from small-pox were 250 to 316 in 1874.

Broach collectorate.

90. In Broach collectorate 23·4 per mille of population were successfully vaccinated, or a fall of 2 as compared with the preceding year. The deaths from small-pox were 17 to 70 in 1874.

Kaira collectorate.

91. In Kaira collectorate there were 27·5 per mille as compared with 25·7 of the previous year successfully vaccinated. 600 deaths are returned as from small-pox; but the returns are wrong, as many deaths from measles are returned as from small-pox.

Panch Máháls.

92. In Panch Máháls the progress is very good; there were 38·7 per mille of population successfully vaccinated, or 0·9 less than in 1874-75. Re-vaccinations have increased from 472 to 1,104. Only 13 deaths from small-pox.

Native States in the Eastern Guzerat circle.

93. The native states in this circle are Rewa Kánta, Máhi Kánta, Cambay, Dharampur, Bansda, and Sachin. There was no change in the number of the staff, but one vaccinator has been reduced in Lunáwára, and one more employed in Chota Udepur. There were 25·7 per mille of population successfully operated on. Progress is very satisfactory.

Progress in Western Guzerat circle.

94. The Western Guzerat circle is superintended by Dr. Blomfield. There was 1 more vaccinator than in the previous year. Each has now an average population of 65,010. The primary successful vaccinations numbered 112,241, giving 30·7 per mille of population, or 1·7 more than in the preceding year. The re-vaccinations have slightly decreased. On an average each vaccinator operated on 2,188, or 47 more than in 1874-75 and 193 above the general average. The cost of each successful case was annas 3-9, or exactly the same as in 1874-75: this is anna 1-2 below the general average.

Ahmedabad collectorate.

95. In Ahmedabad zillah there was 1 more vaccinator entertained for the Ranpur petha of Dhanduka taluka; each vaccinator has now an average of 57,808 of a population. There were 27·4 per mille successfully vaccinated to 25·7 of the previous year. Small-pox carried off 177, or 211 fewer than in 1874.

Province of Kattywar.

96. In Kattywar the staff remained unchanged. There were 32·9 per mille of population successfully vaccinated, or an increase of 1·8 over the preceding year. Each vaccinator operated on 2,355 persons on an average, or 360 above the general average; but 8 vaccinators were dismissed for falsifying their registers.

Pálanpur States.

97. In Pálanpur States there was no change. The number of successful primary vaccinations per mille of population was 26·6, or 1·8 above the preceding year.

Progress in Sind circle.

98. The Sind circle is in charge of Dr. Williams. During the year there was 1 vaccinator less employed than the sanctioned strength, and also 1 assistant superintendent less. The number of primary successful vaccinations was 65,954, or 28·3 per mille of population—a fall of 10·8 as compared with the preceding year. This is compensated for by a large increase in the number of re-vaccinations, which amounted to a total of 87,092 as compared with 48,504 in 1874-75. The percentage of success in re-vaccinations was 89·6, which is so high as to suggest the idea that many of the cases were really primary vaccinations, and this remark applies to other circles. Each vaccinator on an average operated on 3,060 persons, or 270 more than in the preceding year and 1,065 above the general average, but more than half were re-vaccinations. The cost of each successful case was annas 3-9 to 4-2 in 1874-75. 48 deaths from small-pox are returned; but the vaccinators and assistant superintendents report 90 as having occurred; in the previous year there were 31.

Kurrachee collectorate.

99. Kurrachee collectorate.—No change in the staff. The successfully vaccinated were equal to 32·3 per mille of population, or 8·6 below the preceding year. Only 5 deaths from small-pox.

Hyderabad collectorate.

100. In Hyderabad collectorate the staff was unchanged. The successfully vaccinated, equalled 25·4 per mille of population, or 6·4 below the year 1874-75. Small-pox deaths were 7 only.

Shikarpur collectorate.

101. Shikarpur collectorate.—Staff unchanged. The primary successful vaccinations were equal to 25·4 per mille of population, or 10·5 below the previous year. Small-pox only caused 1 death.

102. Thar and Párkar staff was unchanged. 39·4 per mille of population were successfully vaccinated, or 15·1 below the preceding year; but this is still very high. The deaths from small-pox were 35 to 5 in 1874. Thar and Párkar.

103. In the Upper Sind Frontier district only 2 of the 3 vaccinators were employed during the year. The number of primary successful vaccinations equal 19·5 per mille of population, or 20·2 of a fall as compared with the preceding year. No deaths from small-pox. Frontier District.

104. Khairpur is the only native state in the Sind circle; in it there are 2 vaccinators employed who successfully vaccinated 39·2 per mille of the population, or 29·9 below the previous year, but still very high. Now that the work here has been so well carried out for the last two years we must expect the numbers to decrease. Khairpur State.

105. There has been no change in the staff in Baroda circle, but 2 extra vaccinators were temporarily employed for a short time. The successful primary vaccinations were 17·3 per mille of population, or an increase of 4·1 as compared with the preceding year, and the percentage of success was 0·3 higher. Each vaccinator on an average operated on 1,679, or 384 more than in 1874-75, but 316 below the general average. The cost was only annas 3-4 per each successful case, or 10 pies below the former year. Progress in Baroda circle.

106. The progress in Cutch is considerable, and gives promise of a still further extension of vaccination in H. H. the Rao's territory. The number of vaccinators was increased from 11 to 12, and the number successfully vaccinated was equal to 9·6 per mille of population, or 3·9 higher than in 1874-75. Each vaccinator averaged 436 operations, or 161 more than in the preceding year, but 1,559 below the general average. The cost of each successful case was reduced from annas 14-8 in 1874-75 to annas 10-11 in the year under report. There is still much room for progress in all respects here. Progress in Cutch circle.

107. Epidemic cholera occurred in many zillahs of this presidency, and to some extent interfered with the vaccinators carrying on their work. It was considered injudicious to carry vaccinifers from one village to another during the prevalence of cholera, and so there was a diminution in the numbers vaccinated during the prevalence of cholera in a district. Epidemics: Cholera.

108. Measles was also epidemic, and there is not the least doubt but many deaths from that disease have been returned as having occurred from small-pox. Measles.

109. Inspection of dispensaries is now one of the duties of superintendents— Inspection of dispensaries.

1*st*.—In the Central circle I inspected the dispensaries of Talegaon, Khed, Junnar, Sangamner, and Karmála. I sent my report on each to the Deputy Surgeon-General, Poona Division.

2nd.—In the Southern circle Dr. Raby inspected 5 dispensaries, but I have no information as to any beyond Mundgod, Supa, and Yellápur, nor do I know whether he reported on them to the Deputy Surgeon-General of the division.

3rd.—In the Western circle Dr. Cody says:—"I inspected the "vaccine work at 9 dispensaries, and at 8 of them—viz. "Sinnar, Máhim, Bassein, Mahád, Alibág, Uran, Yeola, and "Chopra—I made a general inspection as well. My inspec- "tions were all most satisfactory, and in no instance had I "any complaints to make. The Uran dispensary had run "completely out of the most useful medicines in ordinary "every day use."

4th.—In the Eastern Guzerat circle Dr. Colah inspected 14 of the 21 in his circle, and reported on them to the Deputy Surgeon-General of the division.

5th.—Dr. Blomfield inspected the dispensaries of Gondal, Dhoráji, Upleta, Bhayawadar, Bardé Chowkey, Sarsi, and Manickwara.

6th.—In Sind Dr. Williams reports:—"I did very little in the "shape of inspecting dispensaries this time, as I travelled "a considerable part of the distance with the Deputy Sur- "geon-General, Dr. Miller, and when not with him his in- "spections were so recently done that it did not appear "to be desirable to overhaul the dispensary officer, but "confined myself to vaccination." He visited 11 dispensaries in all.

Health officers' duties

110. The superintendents of vaccination in the Central, Southern, Western, Eastern Guzerat and Sind circles are now health officers in their districts. With reference to the new duties, I am rather at a loss to know if Government wish me to report on this part of the superintendents' work of the past year, and I have not asked them to notice this subject in their usual annual reports on the progress of vaccination; but as Government may not otherwise obtain any information I will briefly say all I know.

In the Central circle I gave advice, in all the larger towns which I visited while on my tour, regarding conservancy, drainage, and drinking water, and I also inspected the birth and death registers in the 221 villages where I inspected vaccinated children. The assistant superintendents have done very much as I did, and the vaccinators have also brought to notice errors in the birth registers. Very many birth registers were found imperfect, and many children had not been registered. Each case of such omission was reported to the collector of the zillah. Many registrars were warned to be more careful in future, and others were fined. In almost every case where advice was given to remove decaying rubbish, &c., from a town, the people acted on it, but in a few positive refusals were given. In the latter cases I did nothing, as I considered it more judicious to wait a year and again try the effect of advice before asking the collector to aid me with his influence.

Dr. Raby reports:—"Under the presumption that the scheme "recommended by the Government of Bombay, to be brought into "force on the 1st January last, will receive the sanction of the "Government of India, I have paid careful attention to any sani- "tary deficiencies or shortcomings in villages, and where I consi- "dered necessary have reported the matter to the Collector or "other official."

Dr. Cody reports:—"While on tour I examined in every "village I visited the registers of births and deaths, made sugges- "tions as to conservancy, &c., &c., of which I have taken a good "many notes in my working diary, thus giving effect to that part "of Government Resolution No. 3750, dated 16th December 1875, "which relates to my duties as health officer."

Although I have no reports from Drs. Colah and Williams, yet I have reason to believe they have also given their attention to sanitary matters in their circles.

111. I conclude this report by saying the work of the past year is, take it all in all, the best I have ever recorded. The progress of vaccination has considerably extended at comparatively less cost than in any of the preceding seven years I have been at the head of the department.

112. This Government have proposed to unite my duties with those of the Sanitary Commissioner. Without in any way criticising the proposal, I am bound to say I fear the additional office work thus to be thrown on the Sanitary Commissioner may be inconvenient if he is to travel more than his predecessors. If the proposal be sanctioned by the Government of India this will be the last vaccination report I shall ever write; and I cannot let the opportunity go past without expressing my great thanks to the officers of the department, who have all so ably and so willingly aided me to carry out the intentions of the reorganization of 1871, which with their energy and zeal has carried vaccination to the very doors of every village in British territory and to nearly every one in the native states' territory in Western India.

J. PINKERTON, M.D., Surgeon-Major,
Superintendent General of Vaccination,
Bombay Presidency.

Bombay, 20th May 1876.

TABLES

OF

VACCINATION RETURNS, &c.,

FOR

1875-76.

Ten-Year Statement called for by H. M.'s Secretary of State's

COMPARATIVE STATEMENT showing the Number of Persons primarily in the Bombay Presidency in

Note.—Only the actual number of persons vaccinated, and not the number of

Establishments.	Persons primarily								
	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.
	Years ended 31st December.								Years
	1866.		1867.		1868.		1870.		18
Government	263,911	245,738	264,100	247,018	274,422	257,180	280,148	261,554	245,625
Municipal	14,080	12,857	18,391	16,896	25,462	23,865	26,169	24,636	41,099
Local Funds	23,594	21,300	21,854	21,022	23,612	22,966	28,726	27,270	59,032
Native States	74,743	69,221	82,832	76,574	96,681	89,614	112,937	105,219	133,977
Dispensaries	3,169	2,819	4,238	3,765	6,076	5,363	9,882	8,405	9,241
Army .. { European ..	*	*	*	*	*	*	907	907	960
Army .. { Native ..	*	5,180	*	6,320	5,931	5,872	5,898	*	6,598
Total ..	379,497	357,115	391,415	371,595	432,184	404,860	464,667	427,391	496,532

* The figures are

ABSTRACT of the Vaccination Statements of Figures,

1	2		3		4	5	6		
Establishments.	Number of vaccinators.		Total number of persons vaccinated and re-vaccinated		Square miles.	Population of area included in last column.	Primary vaccina		
							A.	B.	C.
	1875-76.	1874-75.	1875-76.	1874-75.			Successful.	Unsuccessful, including those doubtful.	Unknown.
Government	2	2	4,763	4,838		74,819	4,552	103	51
Municipal	50	51	81,766	60,000		1,752,855	55,698	2,486	2,168
Local Funds	207	203	462,320	427,658	123,590	13,671,404	364,503	7,988	5,143
Dispensaries	..	..	23,744	21,192		876,367	18,156	1,290	800
Army .. { European	..	..	825	728		13,688	825	..	..
Army .. { Native	4	4	7,482	6,552		144,746	5,506	526	59
Native States	130	129	227,453	211,656	71,392	8,633,355	211,316	7,958	6,210
Administration and Superintendence charges	..	..	..	..	..	..	..	..	..
Total ..	393	389	808,353	732,624	194,982	25,167,234	660,556	20,351	14,431

Details of Column 3.

Total number of persons vaccinated 808,353
Deduct persons re-vaccinated 117,714

Number of persons primarily vaccinated .. 690,639

Details of Primary

Total number of operations (Column
Deduct excess of operations over per

Number of persons primarily vacci

letter No. 103—Statistics and Commerce—dated 28th October 1875.

vaccinated, and the Number of those Persons who were successfully vaccinated each of the undermentioned years.

operations, is shown. Re-vaccinations are wholly excluded from this statement.

vaccinated.

Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.	Total number.	Number successfully vaccinated.

ended 31st March.

71.	1872.		1873.		1874.		1875.		1876.	
229,514	79,022	73,398	3,446	3,012	3,208	2,867	4,517	4,365	4,706	4,552
35,055	55,011	44,879	53,415	45,372	51,313	44,129	54,810	51,162	59,392	55,698
55,247	221,433	208,413	309,666	283,655	357,162	326,852	377,558	361,689	375,202	364,503
123,991	152,213	142,039	180,314	163,891	188,788	171,657	209,689	195,729	224,730	211,316
7,894	13,792	11,998	16,685	14,652	18,560	16,403	19,393	17,463	19,954	18,156
960	1,080	1,080	1,517	1,517	1,122	1,122	728	728	825	825
*	4,552	4,211	4,982	4,627	5,665	5,245	5,122	4,846	5,830	5,506
452,661	527,153	486,018	570,025	516,726	625,818	568,275	671,817	635,982	690,639	660,556

not available.

showing the Work by Establishments for 1875-76.

		7					8		9	10	11	12
tions.		Re-vaccinations.					Percentage of success, excluding those unknown from the total.					
D.	E.	A.	B.	C.	D.	E.						
Total.	Excess of operations over persons.	Successful.	Unsuccessful including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.	Number successfully vaccinated primarily per 1,000 of population.	Amount expended.	Cost of each successful case.
											Rs. a. p.	Rs. a. p.
4,706	..	28	27	2	57	..	97·7	50·9	2,381	60·8	506 13 8	0 1 9
60,352	960	15,198	4,686	3,220	23,104	730	95·7	76·4	1,635	31·7	16,123 2 5	0 3 7
377,634	2,432	73,588	9,618	4,041	87,247	129	97·8	88·4	2,233	26·6	60,635 10 11	0 2 2
20,246	292	2,648	748	419	3,815	25	93·3	77·9	..	20·7	....	....
825	..	..	..	..	..	..	..	..	..	60·2	....	....
6,091	261	1,104	618	6	1,728	76	91·2	64·1	..	38·0	....	....
225,484	754	1,902	623	198	2,723	..	96·3	75·3	1,749	24·4	40,422 14 9	0 3 0
..	..	..	..	..	..	..	..	..	..	..	1,05,063 7 11	....
695,338	4,699	94,468	16,320	7,886	118,674	960	97·0	85·2	1,995	26·2	2,22,802 1 8	0 4 11

Vaccinations.

6 D.) 695,338
sons (Column 6 E.) .. 4,699

nated 690,639

Details of Re-vaccinations.

Total number of operations (Column 7 D.) 118,674
Deduct excess of operations over persons (Column 7 E.) 960

Number of persons re-vaccinated 117,714

A.—VACCINE

STATEMENT No. I., showing Particulars of Vaccinaton in each Circle

1	2	3		4		5		6		7	8					
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary				
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.					Sex.				
												Males.	Females.	Christian.	Hindu.	
Presidency Circle.	Ananta Chandrobá, Assistant Surgeon.			1	1	1,635	380	City of Bombay.	19	16,661	Colábá	299	171	63	275	
				1	1	5,375	365			32,095	Fort	757	479	66	211	
				1	1	1,072	397			10,464	Esplanade ..	237	171	16	64	
				1	1	1,768	572			43,198	Market	709	467	22	711	
				1	1	531	538			35,100	Mándví	292	203	2	312	
				1	1	689	381			36,748	Chakhlá ..	401	248	5	152	
				1	1	995	1,008			49,873	Umbarkhádi ..	252	148	52	163	
				1	1	979	1,296			25,556	Dongari ..	534	427	3	683	
				1	1	2,191	676			37,915	Dhobi Taláo ..	711	573	167	574	
				1	1	340	308			20,760	Phanaswádi ..	170	120	6	273	
				1	1	1,450	746			36,029	Bhuleshwar ..	808	477	19	565	
					1	852	474			23,638	Khárá Taláo ..	448	306	4	192	
					1	365	593			27,594	Kumbhárwádá.	207	153	7	318	
				1	1	1,544	844			21,234	Khetwádi ..	559	431	40	657	
				1	1	1,552	870			24,817	Girgaum ..	667	461	125	868	
					1	433	143			7,581	Chowpáti ..	133	88	6	147	
				1	1	1,265	250			7,741	Wálkeshwar ...	217	126	19	227	
					1	780	326			4,317	Máhálakshumi .	262	208	11	393	
				1	1	1,271	623			20,973	Mázagáon ..	380	272	131	340	
					1	695	147			10,083	Tád Wádi ..	141	74	19	158	
				1	1	2,028	1,122			46,996	Kamáthipura...	733	806	80	759	
				1	1	1,797	783			28,032	Byculla	154	156	67	158	
				1	1	1,599	686			13,773	Parel	612	506	60	797	
					1	204	154			4,460	Shiwri	113	87	4	182	
					1	460	241			11,572	Sion	280	144	81	328	
				1	1	1,083	509			14,310	Máhim	477	321	162	571	
					1	231	142			10,042	Warli	141	90	32	193	
				...	..	2,298	64			22,953	Harbour ..	146	1	3	..	
						176	78			..	Out Stations ..	54	33	61	9	
Total of Presidency Circle.		...	..	16	16	35,658	14,707		19	6,44,405		10,884	7,747	1,333	10,280	
Central Circle.	J. Pinkerton, M.D., Surgeon-Major, officiating.			2	2	3,250	3,273	Ahmednagar Collectorate	548	1,09,888	Nagar	1,594	1,624	45	2,447	
				1	1	1,670	2,015		731	82,422	Párner	803	863	..	1,372	
				1	1	1,883	1,875		610	64,936	Shrigonda ..	962	921	..	1,483	
				1	1	1,875	1,942		567	48,766	Karjat ..	956	917	..	1,531	
				1	1	2,328	2,072		550	72,994	Jámkhed ..	1,123	1,105	..	1,902	
		1	1	1	1	3,412	3,001		682	83,226	Sheogaon ..	1,693	1,718	..	2,725	
				1	1	1,971	1,733		621	62,418	Newása	1,000	947	5	1,498	
				1	1	2,645	2,519		469	59,033	Ráhuri	1,322	1,322	16	1,950	
				1	1	3,099	1,465		505	60,839	Kopargaon ..	1,507	1,556	6	2,227	
				1	1	2,563	2,296		688	58,787	Sangamner ..	1,208	1,355	1	2,110	
				1	1	2,255	2,023		676	60,591	Akola	1,095	1,150	..	1,987	
		1	1	12	12	26,851	24,214		6,647	763,960		13,263	13,478	73	21,232	

DEPARTMENT.

of Superintendence in the Bombay Presidency during the Year 1875-76.

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												Average number of persons vaccinated by each vaccinator.
Musalman.	Parsi.	Other Castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
21	20	91	271	199	427	130	29	486	16	745	406	26	1,177	12	93·4	64·7	7,010
73	819	67	531	705	1,147	29	53	1,329	93	3,032	982	261	4,325	186	89·8	75·8	
30	12	286	255	153	383	29	16	428	20	510	162	10	682	18	92·9	75·8	2,840
250	184	9	588	588	1,104	84	48	1,236	60	473	109	13	595	3	92·9	81·2	
146	9	26	238	257	461	27	15	503	8	33	3	1	37	1	94·4	91·6	1,220
416	51	25	328	321	611	29	20	660	11	37	3	..	40	..	95·4	92·5	
143	6	36	247	153	358	28	24	410	10	383	203	25	611	16	92·7	65·3	1,974
199	..	76	624	337	875	143	49	967	6	15	2	1	18	..	95·3	88·2	
23	468	52	659	625	1,180	31	56	1,367	83	712	176	66	954	47	90·0	80·1	2,191
3	7	1	173	117	269	27	6	302	12	34	13	3	50	..	90·8	72·3	340
621	59	21	611	674	1,205	40	55	1,300	15	128	29	8	165	..	96·7	81·5	1,450
439	40	79	367	387	689	52	33	774	20	72	19	9	100	2	92·9	79·1	1,217
18	1	16	251	109	327	14	21	362	2	5	..	..	5	..	95·8	100	
70	163	60	624	366	928	52	43	1,023	33	439	93	23	555	1	94 6	82·5	1,544
26	97	12	633	495	1,050	69	55	1,174	46	324	96	39	459	35	93·8	77·1	1,935
10	49	9	141	80	206	12	18	236	15	160	51	3	214	2	94·4	75·8	
5	31	61	213	130	323	22	10	355	12	684	232	32	948	26	93·6	74·6	2,045
11	20	35	293	177	439	40	15	494	24	245	60	7	312	2	91·6	80·3	
93	44	44	370	282	580	46	39	665	13	482	100	50	632	13	92·6	82·8	1,966
17	7	14	139	76	208	6	5	219	4	397	151	7	555	75	97·1	72·4	
378	9	313	747	792	1,417	92	46	1,555	16	324	142	54	520	31	93·9	69·5	2,028
40	7	38	174	136	270	29	22	321	11	1,027	453	98	1,578	91	90·3	69·3	1,797
74	29	148	776	332	1,044	74	23	1,141	33	331	163	29	523	32	93·3	67·0	
13	1	..	144	56	195	8	1	204	4	4	..	..	4	..	96·0	100	1,803
3	1	11	274	150	387	51	4	442	18	26	10	..	36	..	88·3	72·2	
28	18	19	448	350	712	97	21	830	32	194	126	6	326	41	88·0	60·6	1,774
5	1	..	127	104	198	41	1	240	9	..	..	..	..	..	82·8	..	
144	..	..	3	144	122	2	23	147	..	238	18	1,895	2,151	..	98·3	92·9	..
3	6	8	44	43	51	5	33	89	2	66	6	17	89	..	91·0	91·6	..
3,302	2,159	1,557	10,293	8,338	17,166	1,309	784	19,259	628	11,170	3,808	2,683	17,661	634	92·9	74·5	2,228
240	9	477	1,757	1,461	3,192	14	12	3,218	..	21	11	..	32	..	99·5	65·6	1,625
91	..	203	540	1,126	1,628	23	16	1,667	1	2	..	2	4	..	98·6	100	1,670
69	..	331	880	1,003	1,765	40	82	1,887	4	..	..	..	..	..	97·7	..	1,883
76	..	266	1,453	420	1,847	20	26	1,893	20	2	..	..	2	..	98·9	100	1,875
130	..	196	963	1,265	2,214	16	11	2,241	13	..	..	..	..	..	99·2	..	2,228
244	..	442	1,017	2,394	3,369	38	4	3,411	..	..	1	..	1	..	98·8	..	3,412
109	..	335	1,309	638	1,938	15	..	1,953	6	24	..	..	24	..	99·2	100	1,971
164	1	513	1,991	653	2,580	40	44	2,664	20	1	..	..	1	..	98·4	100	2,645
156	..	674	1,152	1,911	3,044	26	..	3,070	7	32	4	..	36	..	99·1	88·8	3,099
80	..	372	1,099	1,464	2,516	47	..	2,563	..	..	..	..	..	..	98·1	...	2,563
24	..	234	1,043	1,202	2,239	5	1	2,245	..	9	1	..	10	..	99·7	90·0	2,255
1,383	10	4,043	13,204	13,537	26,332	284	196	26,812	71	91	17	2	110	..	98·9	84·2	2,237

1	2	3		4		5		6		7	8		A. Sex.			
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.		Males.	Females.	Christian.	Hindu.
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.									
Central Circle—*concluded.*	J. Pinkerton, M.D., Surgeon-Major, officiating.	1	1	1	1	1,555	1,736	Poona Collectorate.	660	96,578	Junnar ..		763	792	1	1,404
				1	1	1,313	1,628		567	54,652	Indápur ..		896	883	..	1,470
				2	2	2,728	2,272		799	139,152	Khed ..		1,397	1,331	..	2,521
				1	1	1,648	1,643		558	71,935	Sirur ..		776	867	..	1,326
				1	1	2,211	2,117		442	66,214	Purandhar ..		1,131	1,080	..	1,854
				1	1	2,562	1,657		1,002	110,322	Bhimthari ..		1,270	1,292	..	2,069
				1	1	3,083	3,236		766	155,082	Haveli ..		1,596	1,445	..	2,668
				1	1	1,436	1,620		357	51,794	Máwal ..		682	754	17	1,174
				2	2	3,119	2,567		4	90,436	Poona City ..		1,637	1,175	59	2,170
		1	1	11	11	20,155	18,476		5,095	836,165			10,148	9,619	77	16,656
				1	1	2,329	2,593	Satara Collectorate.	393	121,712	Karád ..		1,177	1,142	..	1,934
				1	1	3,918	2,956		551	147,699	Wálwa ..		1,994	1,917	2	3,223
				2	2	3,598	3,568		321	115,113	Satara ..		1,771	1,768	14	3,073
				1	1	2,241	2,145		389	75,033	Wai		1,142	1,086	1	1,902
				1	1	2,196	2,966		433	59,836	Jauli		1,102	1,091	..	1,939
				1	1	2,234	1,870		510	76,783	Khánápur ..		1,147	1,087	..	1,877
				1	1	2,743	2,453		342	82,344	Koregaon ..		1,379	1,357	..	2,288
				1	1	1,426	1,575		627	55,877	Mán ..		690	734	..	1,189
				1	1	3,443	3,488		409	112,488	Pátan ..		1,731	1,670	..	2,853
				1	1	2,077	2,203		500	79,494	Khatau ..		987	1,081	..	1,646
				1	1	2,478	1,914		324	87,975	Táskgaon ..		1,243	1,220	..	2,099
				..	..	78	..		5	1,247	Máhableshwar		37	41	..	69
		2	2	12	12	28,761	27,731		4,804	1,015,571			14,400	14,194	17	24,092
				2	2	4,274	3,993	Sholápur Collectorate.	841	127,184	Sholápur ..		2,187	2,019	16	2,952
				2	2	3,534	3,327		606	130,853	Bársi ..		1,809	1,720	1	3,003
				1	1	2,149	2,053		762	98,532	Karmála ..		1,096	1,053	..	1,821
		1	1	1	1	2,435	2,216		613	103,931	Mádha ..		1,223	1,206	..	1,978
				2	2	3,770	3,360		455	79,314	Pandharpur .		1,882	1,782	..	2,873
				1	1	2,385	1,800		648	62,969	Sángola ..		1,193	1,135	..	1,833
				2	2	2,662	2,699		574	55,048	Málsiras ..		1,310	1,270	..	2,055
		1	1	11	11	21,209	19,448		4,499	657,872			10,700	10,235	17	16,515
				2	2	4,658	4,713	Ratnágiri Collectorate.	108	108,277	Málwan ..		2,167	2,042	72	3,854
				1	1	3,024	2,952		508	118,921	Deogarh ..		1,515	1,482	7	2,686
				2	2	4,983	4,049		785	168,498	Rájápur ..		2,513	2,417	2	4,201
		1	1	1	1	2,559	2,568		381	119,741	Ratnágiri ..		1,316	1,213	..	2,077
				1	1	2,579	2,457		447	91,989	Sangameshwar		1,273	1,208	..	2,200
				2	2	5,161	6,085		744	163,930	Chiplun ..		2,087	1,981	..	3,481
				1	1	3,321	2,574		395	89,647	Khed ..		1,597	1,585	..	2,749
				1	1	3,146	2,660		590	140,542	Dápoli ..		1,429	1,352	..	2,436
		1	1	11	11	29,431	28,058		3,868	1,001,545			13,897	13,280	81	23,684
				1	1	1,986	1,805	Native States.	498	72,598	Akalkot ..		999	984	..	1,297
				1	1	1,391	1,615		213	68,335	Atpadi ..		675	710	..	1,149
		..	..	2	2	5,068	1,945		1,491	136,075	Bhor ..		2,579	2,482	..	4,594
				1	1	1,775	1,229		397	59,124	Phaltan ..		897	870	..	1,418
				1	1	1,591	1,554		770	70,665	Jat ..		775	768	..	1,356
		..	..	6	6	11,811	8,148		3,369	406,797			5,925	5,814	..	9,814
Total of Central Circle.		6	6	63	63	138,218	126,075		28,282	4,681,910			68,333	66,620	265	1,11,993

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												Average number of persons vaccinated by each vaccinator.
Mussalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
74	..	76	863	692	1,546	7	2	1,555	..	..	..	..	..	..	99·5	..	1,555
56	..	253	726	1,053	1,716	89	..	1,805	26	29	7	..	36	2	95·0	80·5	1,813
68	..	139	844	1,384	2,649	79	47	2,775	47	..	..	..	..	..	97·1	..	1,364
44	..	273	708	935	1,639	4	..	1,643	..	5	..	..	5	..	99·7	100	1,648
31	..	326	1,015	1,196	2,207	3	3	2,213	2	..	..	..	..	..	99·8	..	2,211
60	..	433	905	1,657	2,493	51	18	2,562	..	..	..	..	..	..	97·9	..	2·562
31	..	342	1,015	2,026	3,020	14	7	3,041	..	17	18	7	42	..	99·5	48·5	3,083
18	..	227	635	801	1,416	18	7	1,441	5	..	..	..	..	..	98·7	..	1,436
248	22	313	1,581	1,221	2,521	79	213	2,813	1	191	114	2	307	..	96·9	62·6	1,559
630	22	2,382	8,292	11,475	19,207	344	297	19,848	81	242	139	9	390	2	98·2	63·5	1,832
76	..	309	1,084	1,235	2,230	55	55	2,340	21	8	1	2	11	1	97·5	83·8	2,329
155	..	531	1,037	2,874	3,859	30	23	3,912	1	2	5	..	7	..	99·2	28·5	3,918
191	2	259	1,794	1,745	3,452	134	26	3,612	73	44	11	4	59	..	96·2	80·0	1,799
49	..	276	1,164	1,064	2,209	18	5	2,232	4	12	1	..	13	..	99·1	92·3	2.241
20	..	234	743	1,450	2,165	20	10	2,195	2	3	..	..	3	..	99·0	100	2,196
83	..	274	1,308	926	2,222	21	..	2,243	9	..	..	..	..	..	99·0	..	2,234
82	..	386	1,384	1,352	2,694	41	40	2,775	39	6	1	..	7	..	98·5	85·7	2,743
28	..	207	290	1,134	1,424	..	..	1,424	..	2	..	..	2	..	100	100	1,426
48	..	509	823	2,578	3,346	46	14	3,406	5	40	2	..	42	..	98·6	95·2	3,443
90	..	332	856	1,212	2,048	2	18	2,068	..	6	3	..	9	..	99·9	66·6	2,077
119	..	245	1,458	1,005	2,463	12	..	2,475	12	6	7	2	15	..	99·5	46·1	2,478
..	..	9	22	56	76	..	2	78	..	..	..	..	..	..	100	..	....
941	2	3,542	11,963	16,631	28,188	379	193	28,760	166	129	31	8	168	1	98·6	80·6	2,396
597	11	630	2,273	1,933	4,129	17	60	4,206	..	61	7	..	68	..	99·5	89·7	2,132
233	..	292	1,758	1,776	3,345	238	72	3 655	126	5	..	..	5	..	93·3	100·	1,767
76	..	252	771	1,378	2,120	129	23	2,272	123	..	..	..	..	..	94·2	..	2,149
118	1	332	1,271	1,158	2,401	35	10	2,446	17	5	1	..	6	..	98·5	83·3	2,435
199	..	592	2,227	1,437	3,615	38	12	3,665	1	80	24	2	106	..	98·9	76·9	1,885
96	..	449	1,268	1,110	2.287	111	26	2,424	46	5	2	..	7	..	95·3	71·4	2,385
109	..	416	1,591	989	2,499	27	57	2,583	3	76	3	3	82	..	98·9	96·2	1,331
1,428	12	2,963	11,154	9,781	20,396	595	260	21,251	316	232	37	5	274	..	97·1	86·2	1,928
79	..	264	1,220	2,989	4,175	85	..	4,260	51	377	72	..	449	..	98·0	83·9	2,329
76	..	228	1,286	1,711	2,963	55	3	3,021	24	11	14	2	27	..	98·1	44·0	3,024
313	..	414	1,999	2,931	4,912	71	1	4,984	54	45	8	..	53	..	98·5	84·9	2,492
261	..	191	610	1,919	2,483	59	2	2,544	15	21	9	..	30	..	97 6	70·0	2,559
75	..	206	1,207	1,274	2 481	26	..	2,507	26	97	1	..	98	..	98·9	98·9	2,579
167	..	420	1,539	2,529	4,024	100	..	4,124	56	909	184	..	1,093	..	97·5	83·1	2,580
18	..	415	1,422	1,759	3,165	20	..	3,185	3	104	35	..	139	..	99·3	74·8	3,321
157	..	188	1,061	1,720	2,774	28	..	2,802	21	289	76	..	365	..	99·0	79·1	3,146
1,146	..	2,266	10,345	16,832	26,977	444	6	27,427	250	1,853	399	2	2,254	..	98·3	82·2	2,675
315	..	371	1,222	761	1.920	67	63	2,050	67	3	..	..	3	..	96·6	100	1,986
48	..	188	289	1,096	1,364	24	1	1,389	4	2	..	4	6	..	98·2	100	1,391
35	..	432	1,477	3,584	4,958	49	58	5,065	4	6	..	1	7	..	99·0	100	2,534
54	..	295	799	968	1,651	78	81	1,810	43	6	2	..	8	..	95·4	75.0	1,775
101	..	86	869	674	1,543	10	..	1,553	10	48	..	..	48	..	99·3	100	1,591
553	..	1,372	4,656	7,083	11,436	228	203	11,867	128	65	2	5	72	..	98·0	97·0	1,968
6,081	46	16,568	59,614	75,339	132,536	2,274	1,155	135,965	1,012	2,612	625	31	3.268	3	98·3	80·6	2,193

1	2	3		4		5		6		7	8		Primary			
													A.			
													Sex.			
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.		Males.	Females.	Christian.	Hindu.
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.									
Southern Circle.	J. Raby, Surgeon.	1	1	2	2	2,020	3,166	Belgaum Collectorate.	608	134,621	Belgaum	..	1,551	1,278	63	2,305
				1	1	4,326	2,424		409	131,504	Sampgaon	..	2,172	2,093	2	3,820
				1	1	1,388	2,151		632	78,875	Bidi	..	935	883	89	1,568
				3	2	5,744	3,446		848	248,685	Chikori	..	2,999	2,706	..	4,914
				2	1	2,441	1,790		638	120,691	Parasgad	..	1,175	1,243	..	2,155
				1	2	1,580	2,172		668	97,085	Gokák	..	787	750	..	1,372
				2	1	4,633	1,013		789	103,089	Athni	..	2,278	2,210	..	3,794
		1	1	12	10	23,482	16,162		4,592	914,550			11,897	11,163	154	19,928
				2	2	3,958	3,368	Dharwar Collectorate.	460	123,730	Dharwar	..	2,001	1,869	31	3,288
				2	2	3,265	3,291		310	63,277	Hubli	..	1,572	1,624	10	2,591
				1	1	3,230	1,724		565	104,700	Nawalgund	..	1,591	1,634	..	2,798
				2	2	2,485	1,965		701	120,655	Gadag	..	1,196	1,289	4	2,148
				1	1	1,446	2,034		341	83,175	Bankápur	..	558	509	..	894
		1	1	1	1	1,454	2,408		298	67,390	Hángal	..	734	717	..	1,130
				1	1	2,572	2,860		439	95,217	Karajgi	..	1,314	1,258	..	2,142
				1	1	871	728		404	86,601	Ránibennur	.	423	446	..	758
				1	1	780	962		399	79,099	Kod	..	382	398	..	682
				1	1	1,191	1,624		279	52,729	Kalghatgi	..	588	595	32	1,004
				1	1	1,140	955		369	73,503	Ron	..	589	515	..	1,014
		1	1	14	14	22,392	21,919		4,565	950,076			10,948	10,854	77	18,449
				2	2	2,760	3,904	Kaládgi Collectorate.	684	103,593	Bágalkot	..	1,382	1,345	..	2,408
				2	2	3,199	2,996		865	86,311	Bijápur	..	1,595	1,541	..	2,599
				1	1	2,052	2,057		837	105,475	Indi	..	1,089	963	..	1,655
				1	1	2,785	1,856		792	99,798	Sindgi	..	1,408	1,358	..	2,161
		1	1	1	1	3,161	1,551		757	93,738	Bágewári	..	1,582	1,570	..	2,411
				1	1	2,489	2,039		518	105,866	Hungund	..	1,191	1,232	..	2,112
				2	2	2,724	2,618		690	150,816	Bádámi	..	1,379	1,329	..	2,489
				1	1	2,761	2,057		552	83,848	Muddebihál	.	1,412	1,333	..	2,296
		1	1	11	11	21,931	19,078		5,695	809,445			11,038	10,671	..	18,131
				1	1	906	1,640	Kanara Collectorate.	281	31,868	Karwar	..	465	437	40	831
				2	2	2,461	2,687		660	79,110	Coompta	..	1,304	1,118	15	2,152
				2	2	2,806	2,456		400	77,676	Honáwar	..	1,487	1,258	158	2,436
		1	1	1	1	1,914	1,589		550	52,814	Sirsi	..	995	872	..	1,770
				1	1	1,646	2,131		594	32,619	Siddápur	..	881	753	..	1,495
				2	2	1,677	4,360		1,110	48,076	Supa	..	946	728	103	1,437
				2	2	2,266	1,210		640	31,584	Yellápur	..	1,190	964	38	2,039
		1	1	11	11	13,676	16,073		4,235	353,747			7,268	6,130	354	12,160
				1	1	2,400	2,019	Kolhápur States.	321	89,334	Karvir	..	1,202	1,156	4	2,075
				1	1	2,105	2,149		367	106,714	Panhála	..	1,059	1,029	4	1,877
				1	1	1,788	1,076		456	91,148	Budhargarh	.	892	893	19	1,492
				1	1	1,776	1,837		356	79,722	Shirol	..	888	883	..	1,481
				1	1	1,996	1,809		438	128,204	Garh Hinglaj	.	1,085	937	4	1,848
		1	1	1	1	1,119	1,067		192	84,464	Ajra	..	578	536	10	1,019
				1	1	910	786				Torgal	..	430	480	..	868
				1	1	1,609	1,867		235	32,414	Vishálgarh	..	811	798	..	1,357
				1	1	1,937	1,791		83	43,439	Baura	..	942	993	..	1,717
				1	1	1,929	1,322		201	59,330	Inchalkaranji		1,031	895	..	1,715
				1	1	2,018	1,364		129	47,801	Kágal	..	996	954	1	1,665
		1	1	11	11	19,587	17,087		2,778	763,070			9,884	9,554	42	17,114

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman.	Parsi.	Other castes	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
283	1	177	802	2,027	2,695	96	44	2,835	6	49	40	4	93	2	96·6	55·0	1,460
364	..	79	1,268	2,997	4,102	50	124	4,276	11	9	51	1	61	..	98·7	15·0	4,326
86	..	75	627	1,191	1,730	53	58	1,841	23	9	7	4	20	..	97·0	56·2	1,838
422	..	369	2,214	3,491	5,489	128	138	5,755	50	14	20	5	39	..	97·7	41·2	1 914
228	..	35	863	1,555	2,332	91	55	2,478	60	14	9	..	23	..	96·2	60·8	1,220
116	..	49	476	1,061	1,479	31	33	1,543	6	20	20	3	43	..	97·9	50·0	1,580
360	..	334	2,003	2,485	4,422	46	21	4,489	1	77	67	1	145	..	98·9	53·4	2,316
1,859	1	1,118	8,253	14,807	22,249	495	473	23,217	157	192	214	18	424	2	97·8	47·2	1,956
439	..	112	1,319	2,551	3,703	102	68	3,873	3	26	47	15	88	..	97·5	35·6	1,979
529	..	66	1,625	1,571	3,083	115	49	3,247	51	61	5	3	69	..	96·4	92·4	1,632
296	..	131	1,566	1,659	3,168	57	7	3,232	7	4	1	..	5	..	98·2	80·0	3,230
332	..	1	1,116	1,369	2,288	110	99	2,497	12	..	..	..	..	..	95·4	..	1,242
118	..	55	178	889	978	87	51	1,116	49	89	240	51	380	1	91·8	27·0	1,446
229	..	92	276	1,175	1,385	32	49	1,466	15	2	..	1	3	..	97·7	100	1,454
353	..	77	436	2,136	2,242	143	193	2,578	6	..	..	..	..	..	94·0	..	2,572
110	..	1	66	803	791	77	32	900	31	1	1	..	2	..	91·1	50·0	871
87	..	11	162	618	702	51	48	801	21	..	..	..	..	..	93·2	..	780
113	..	34	435	748	1,134	26	26	1,186	3	8	..	..	8	..	97·7	100	1,191
82	..	8	244	860	946	159	61	1,166	62	2	34	..	36	..	85·5	5·5	1,141
2,688	..	588	7,423	14,379	20,420	959	683	22,062	260	193	328	70	591	1	95·5	37·0	1,599
273	..	46	1,747	980	2,520	64	157	2,741	14	20	12	1	33	..	97·5	62·5	1,380
442	..	95	1,845	1,291	2,980	..	156	3,136	..	21	11	31	63	..	100	65·6	1,599
276	..	121	995	1,057	1,995	4	57	2,056	4	..	..	..	..	..	99·7	..	2,052
374	..	231	1,023	1,743	2,595	102	69	2,766	..	14	4	1	19	..	96·2	77·7	2,785
469	..	272	1,281	1,871	3,074	55	55	3,184	32	5	4	..	9	..	98·2	55·5	1,380
204	..	107	1,159	1,264	2,331	12	90	2,433	10	61	..	5	66	..	99·4	100	2,489
201	..	18	1,136	1,572	2,646	19	47	2,712	4	12	4	..	16	..	99·2	75·0	1,362
388	..	61	1,085	1,660	2,634	3	108	2,745	..	3	12	1	16	..	99·8	20·0	2,761
2,627	..	951	10,271	11,438	20,775	259	739	21,773	64	136	47	39	222	..	98·7	74·3	1,993
31	..	..	175	727	800	45	61	906	4	2	1	1	4	..	94·6	66·6	906
33	..	222	263	2,159	2,350	54	18	2,422	..	28	11	..	39	..	97·7	72·0	1,230
87	..	64	173	2,572	2,563	144	60	2,767	22	44	14	3	61	..	94·7	75·8	1,403
10	..	87	128	1,739	1,860	5	2	1,867	..	47	..	..	47	..	99·7	100	1,914
21	..	118	120	1,514	1,586	19	29	1,634	..	12	..	..	12	..	98·8	100	1,646
47	..	87	245	1,429	1,600	45	38	1,683	9	3	..	..	3	..	97·2	100	838
54	..	23	162	1,992	2,080	33	43	2,156	2	107	..	5	112	..	98·4	100	1,133
283	..	601	1,266	12,132	12,839	345	251	13,435	37	243	26	9	278	..	97·3	90·3	1,243
33	..	246	849	1,509	2,237	64	66	2,367	9	16	8	18	42	..	97·2	66·6	2,400
21	..	186	728	1,360	2,064	5	19	2,088	..	9	8	..	17	..	99·7	52·9	2,105
65	..	209	383	1,402	1,746	23	16	1,785	..	1	2	..	3	..	98·7	33·3	1,788
103	..	187	972	799	1,649	14	108	1,771	..	3	2	..	5	..	99·1	60·0	1,776
70	..	70	537	1,455	1,770	86	136	1,992	..	2	2	..	4	..	95·3	50·0	1,996
24	..	61	600	514	1,071	30	33	1,134	20	..	..	5	5	..	97·2	..	1,119
36	..	6	502	408	910	1	..	911	1	..	..	..	..	..	99·9	..	910
60	..	192	941	668	1,493	55	61	1,609	..	..	..	..	..	..	96·4	..	1,609
41	..	177	487	1,448	1,819	..	119	1,938	3	2	..	..	2	..	100	100	1,937
101	..	110	905	1,021	1,792	51	83	1,926	..	3	..	..	3	..	97·2	100	1,929
41	..	243	728	1,222	1,920	8	22	1,950	..	48	9	11	68	..	99·5	84·2	2,018
595	..	1,687	7,632	11,806	18,471	337	663	19,471	33	84	31	34	149	..	98·2	73·0	1,780

1	2	3		4		5		6		7	8				
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary A. Sex.			
		1875-76	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.					Males.	Females.	Christian.	Hindu.
Southern Circle—*concluded.*	J. Raby, Surgeon.			1	1	1,355	1,113	Southern Mahrátta States.	204	103,126	Sángli ..	720	633	..	1,231
				1	1	428	747		311	44,630	Shirhátti ..	212	216	..	394
				1	1	1,724	380		163	49,639	Sháhápur and Dodwad.	913	811	5	1,567
				1	1	1,462	1,229		218	26,268	Mangalvedha	739	720	..	1,143
				1	1	1,825	1,517		403	79,830	Jamkhandi ..	895	911	..	1,607
				1	1	808	565		89	22,516	Kundgol ..	393	362	..	611
				1	1	999	687		277	63,280	Mira (Senior)	517	472	..	751
				1	1	677	502		63	18,921	Lakhmeshwar	327	345	..	572
				1	1	369	505		208	35,601	Miraj(Junior)	193	176	..	360
				1	1	643	1,106		182	39,420	Kurundwad (Elder)	339	303	..	555
				1	1	878	717		114	30,251	Do. (Younger.	458	418	..	707
				1	1	1,569	1,522		362	58,921	Mudhol ..	836	732	..	1,391
				1	1	767	420		140	38,031	Rámdurg ..	378	389	..	696
		..	..	13	13	13,504	11,010		2,734	610,434		6,920	6,488	5	11,585
		..	..	1	1	796	570	Sawanur.	70	17,288	Sawanur ..	371	352	..	478
		..	..	1	1	7,376	7,543	SáwantWári	900	182,797	Sáwant Wári	3,274	3,182	90	6,235
Total of Southern Circle.		5	5	74	72	122,744	109,442		25,569	4,601,407		61,600	58,394	721	104,080
Western Circle.	T. Cody, Surgeon.			2	2	2,465	2,604	Khándesh Collectorate.	759	66,929	Dhulia ..	1,226	1,232	6	2,148
				1	1	1,542	1,666		529	67,628	Amalner ..	825	717	..	1,355
				1	1	2,324	2,545		467	54,531	Erandol ..	1,205	1,111	..	2,187
				1	1	999	1,476		542	84,880	Páchora ..	500	499	..	884
				1	1	1,687	1,899		511	44,563	Chálisgaon ..	833	854	..	1,415
				1	1	2,103	2,186		1,039	60,125	Pimpalner ..	1,088	1,015	..	2,084
				1	1	1,276	1,233		647	45,285	Nandurbár ..	657	619	..	1,147
		2	2	1	1	1,296	895		1,135	35,278	Taloda ..	632	655	..	1,267
				1	1	2,466	2,461		468	46,228	Sháháda ..	1,236	1,226	..	2,349
				1	1	1,844	2,216		507	63,350	Virdel ..	927	916	..	1,616
				1	1	1,299	959		780	34,642	Shirpur ..	674	625	..	1,230
				1	1	1,773	2,215		495	37,882	Chopra ..	860	906	1	1,567
				1	1	2,246	1,907		867	124,519	Sauda ..	1,037	1,209	..	1,704
				1	1	1,526	815		570	84,245	Bhusáwal ..	700	826	1	1,443
				1	1	1,737	2,044		319	60,109	Nasirabad ..	817	916	..	1,565
				1	1	1,633	1,633		527	70,351	Jámner ..	786	847	..	1,394
		2	2	17	17	28,216	28,754		10,162	980,550		14,003	14,173	8	25,355
				2	1	1,632	1,510	Násik Collectorate.	444	67,835	Násik ..	805	827	1	1,606
				1	1	807	695		2	22,436	Do. Town .	357	375	20	639
				1	1	1,983	1,966		507	54,828	Sinnar ..	935	1,047	..	1,811
				1	1	1,502	1,643		672	57,735	Igatpuri ..	767	699	21	1,314
				1	1	1,732	1,799		560	65,496	Dindori ..	878	853	..	1,725
		1	1	1	1	1,581	1,392		371	86,017	Niphád ..	795	786	..	1,475
				1	1	1,794	1,642		323	50,130	Chándor ..	898	895	..	1,429
				1	1	1,241	1,269		482	41,852	Yeola ..	616	625	..	979
				1	1	1,016	1,378		424	30,230	Nándgaon ..	482	448	..	807
				1	1	1,658	1,797		720	59,462	Báglán ..	808	836	..	1,613
				1	1	2,046	2,020		775	57,255	Málegaon ..	991	1,004	..	1,721
				1	..	1,576	324		1,900	53,741	Kalwan ..	786	790	..	1,557
		1	1	12	11	18,568	17,435		7,180	647,017		9,118	9,185	42	16,676
				1	1	1,207	1,580	Colába Collectorate.	192	61,474	Alibág ..	598	600	4	1,155
				1	1	1,478	1,067		192	37,448	Pen	756	715	..	1,452
		1	1			282	641		105	19,401	Nagothna Petha.	149	133	..	279
				1	1	437	1,116		192	41,997	Roha	226	209	..	403
				1	1	1,741	1,661		346	72,733	Mángaon ..	899	824	..	1,334
				1	1	3,642	2,393		455	93,734	Máhád ..	1,918	1,715	..	3,190
		1	1	5	5	8,787	8,458		1,482	331,787		4,546	4,196	4	7,813

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
109	..	13	691	662	1,178	67	115	1,360	7	2	..	..	2	..	94·6	100	1,355
31	..	3	77	351	386	28	16	430	2	..	..	..	..	..	93·2	..	428
132	..	20	657	1,067	1,668	19	45	1,732	8	..	..	..	..	..	98·8	..	1,724
95	..	221	714	745	1,332	1	127	1,460	1	3	..	..	3	..	99·9	100	1,461
155	..	44	977	829	1,760	25	22	1,807	1	16	..	3	19	..	98·6	100	1,825
138	..	6	246	509	656	51	59	766	11	23	24	6	53	..	92·7	48·9	808
190	..	48	385	604	865	54	72	991	2	7	1	2	10	..	94·1	87·5	999
71	..	29	220	452	591	50	47	688	16	1	2	2	5	..	92·1	33·3	677
9	..	..	138	231	367	2	..	369	..	..	..	..	..	..	99·4	..	369
87	..	..	162	480	636	9	7	652	10	..	1	..	1	..	98·6	..	643
90	..	79	469	407	817	25	35	877	1	2	..	..	2	..	97·0	100	878
129	..	48	807	761	1,566	2	..	1,568	..	1	..	..	1	..	99·8	100	1,569
52	..	19	225	542	756	11	..	767	..	..	..	..	..	..	98·5	..	767
1,288	..	530	5,768	7,640	12,578	344	545	13,467	59	55	28	13	96	..	97·3	66·2	1,038
207	..	38	241	482	678	23	26	727	4	49	16	8	73	..	96·7	75·3	796
128	..	3	2,451	4,005	6,216	224	64	6,504	48	599	283	38	920	..	96·5	67·9	7,377
9,675	1	5,516	43,305	76,689	114,226	2,986	3,444	120,656	662	1,551	973	229	2,753	3	97·4	61·4	1,658
192	..	112	1,267	1,191	2,441	10	7	2,458	..	7	..	..	7	..	99·5	100	1,232
72	..	115	318	1,224	1,500	1	42	1,543	1	..	..	..	..	..	99·9	..	1,542
129	..	..	869	1,447	2,303	13	..	2,316	..	8	..	..	8	..	99·4	100	2,324
33	..	82	229	770	933	30	51	1,014	15	..	..	..	..	..	96·9	..	999
65	..	207	949	738	1,641	36	19	1,696	9	..	..	..	..	..	97·9	..	1,687
10	..	9	860	1,243	1,983	76	74	2,133	30	..	..	..	..	..	96·3	..	2,103
79	..	50	576	700	1,245	36	4	1,285	9	..	..	..	..	..	97·1	..	1,276
13	..	7	614	673	1,201	87	35	1,323	36	6	2	1	9	..	93·2	75·0	1,296
85	..	28	1,164	1,298	2,418	49	..	2,467	5	4	..	..	4	..	98 0	100	2,466
85	..	142	688	1,155	1,821	4	22	1,847	4	1	..	..	1	..	99·7	100	1,844
62	1	6	654	645	1,293	35	5	1,333	34	..	..	..	..	..	97·4	..	1,299
105	..	93	1,051	715	1,694	52	42	1,788	22	6	..	1	7	..	97·1	100	1,773
277	..	265	1,064	1,182	2,227	23	3	2,253	7	..	..	..	..	..	98·9	..	2,246
82	..	..	606	920	1,469	52	25	1,546	20	..	..	..	..	..	96·6	..	1,526
111	1	56	1,035	698	1,698	..	35	1,733	..	4	..	..	4	..	100	100	1,737
87	..	152	797	836	1,460	108	129	1,697	64	..	..	..	..	..	93·1	..	1,633
1,487	2	1,324	12,741	15,435	27,327	612	493	28,432	256	36	2	2	40	..	97·8	94·7	1,660
25	..	..	777	855	1,477	104	69	1,650	18	..	..	..	..	..	93·4	..	1,632
73	..	..	336	396	709	23	2	734	2	55	20	..	75	..	96·8	73·3	807
65	..	106	810	1,172	1,766	203	40	2,009	27	..	1	..	1	..	89·7	..	1,983
24	2	105	244	1,222	1,323	174	15	1,512	46	20	15	1	36	..	88·3	57·1	1,502
6	..	..	821	910	1,714	6	17	1,737	6	1	..	..	1	..	99·7	100	1,732
39	..	67	986	595	1,463	122	..	1,585	4	..	..	..	..	..	92·3	..	1,581
43	..	321	1,277	516	1,762	8	25	1,795	2	1	..	..	1	..	99·5	100	1,794
33	..	229	591	650	1,141	90	10	1,241	..	..	..	..	..	..	92·7	..	1,241
44	..	79	392	538	791	174	40	1,005	75	43	33	10	86	..	81·9	56·6	1,016
19	..	12	759	885	1,549	55	56	1,660	16	14	....	..	14	..	96·6	100	1,658
48	..	226	1,160	835	1,946	51	37	2,034	39	3	48	..	51	..	97·4	5·9	2,046
17	..	2	719	857	1,514	..	62	1,576	..	..	....	..	..	..	100	..	1,576
436	2	1,147	8,872	9,431	17,155	1,010	373	18,538	235	137	117	11	265	..	94·4	53·9	1,547
18	..	21	1,088	110	1,160	26	12	1,198	..	5	2	2	9	..	97·8	71·4	1,207
4	..	15	1,265	206	1,458	8	9	1,475	4	3	3	1	7	..	99·5	50·0	1,478
2	..	1	224	58	281	..	1	282	..	..	..	..	..	..	100	..	282
21	..	11	270	165	427	7	1	435	..	1	1	..	2	..	98·4	50·0	437
88	..	301	1,066	657	1,642	91	10	1,743	20	15	3	..	18	..	94·7	83·3	1,741
166	..	277	1,622	2,011	3,464	160	61	3,685	52	8	1	..	9	..	95·6	88·9	3,642
299	..	626	5,535	3,207	8,432	292	94	8,818	76	32	10	3	45	..	96·7	76·2	1,757

1	2	3		4		5		6		7	8		Primary			
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	A. Sex.			
		1875-76.	1874-75.	1875-76	1874-75.	1875-76.	1874-75.					Males.	Females.	Christian.	Hindu.
Western Circle—*concluded.*	T. Cody, Surgeon.	1	1	1	1	1,803	1,720	Tanna Collectorate.	644	110,423	Dáhánu ..	896	896	5	1,639
				1	1	1,579	1,080		413	65,314	Máhim ..	809	770	7	1,472
				1	1	1,104	470		290	32,420	Wára ..	565	536	..	1,079
				1	1	4,488	4,063		849	100,304	Sháhápur ..	2,285	2,195	..	4,466
				1	1	1,355	1,326		345	57,203	Murbád ..	666	689	..	1,211
				1	1	1,768	1,794		259	59,752	Kalyán ..	925	843	..	1,633
				1	1	1,673	1,584		244	58,660	Bhiwandi ..	881	790	..	1,551
				1	1	1,238	1,245		216	51,733	Bassein ..	645	593	243	974
				2	2	2,084	1,354		164	68,798	Salsette ..	1,106	844	438	1,432
				2	2	2,234	2,633		285	83,024	Panwel ..	1,110	1,109	1	2,067
				1	1	1,901	1,393		343	76,150	Karjat ..	968	933	4	1,813
		1	1	13	13	21,227	18,612		4,052	768,781		10,856	10,198	698	19,337
				..	..	....	....	Native States.	3,840	39,111	Khandesh Agency.	....	....	..	....
				1	1	1,222	1,361		960	45,029	Peint ..	638	584	..	1,222
				2	2	2,592	4,310		151	71,996	Janjira ..	1,345	1,164	..	1,920
				1	1	1,377	1,903		534	37,406	Jawhár ..	682	695	..	1,326
		..	..	4	4	5,191	7,574		5,485	193,542		2,665	2,443	..	4,468
Total of Western Circle.		5	5	51	50	81,989	80,333		28,361	2,921,677		41,188	40,195	752	73,649
Eastern Gujerat Circle.	Mancherji Beramji Colah, M.D.	1	1	1	1	2,120	1,985	Surat Collectorate.	3	107,149	Surat City ..	899	918	23	1,272
				1	1	983	1,092		67	38,155	Chorási ..	538	445	..	841
				1	1	2,104	2,505		261	73,271	Bárdoli ..	1,087	1,003	..	2,011
				1	1	1,449	1,424		172	44,071	Mándvi ..	733	701	..	1,388
				1	1	1,424	1,654		355	62,256	Olpád ..	724	674	1	1,160
				1	1	1,936	1,790		167	56,134	Chikhli ..	958	951	..	1,719
				1	1	1,434	1,937		217	66,894	Bulsar ..	708	695	..	1,325
				1	1	1,388	1,637		162	47,050	Párdi ..	704	677	..	1,283
				1	1	1,538	1,722		184	68,580	Jaláipur ..	735	793	..	1,292
		1	1	9	9	14,376	15,746		1,588	563,559		7,086	6,857	24	12,291
		1	1	2	2	2,716	2,643	Broach Collectorate.	250	110,291	Broach ..	1,385	1,324	3	1,650
				1	1	818	1,055		134	31,673	Ankleswar ..	423	395	..	634
						694	616		153	20,589	Hánsot ..	321	371	..	538
				1	1	778	640		304	38,779	Wágra ..	401	374	..	663
						886	811		169	40,260	Amod ..	415	407	..	682
				1	1	1,945	2,784		348	78,325	Jambusar ..	1,017	927	..	1,431
		1	1	5	5	7,837	8,549		1,358	319,917		3,962	3,798	3	5,598
		1	1	1	1	2,617	2,070	Kaira Collectorate.	217	78,673	Mátar ..	1,368	1,194	..	2,089
				1	1	2,124	1,994		246	77,861	Thásra ..	1,106	1,018	..	1,697
				1	1	2,189	2,671		279	72,760	Kapadwanj ..	1,170	1,002	..	1,955
				1	1	3,718	3,880		193	132,314	Borsad ..	1,983	1,682	..	3,082
				1	1	2,465	2,387		166	77,689	Mehmadabad ..	1,182	1,035	..	1,847
				2	2	3,285	3,244		223	142,099	Nariád ..	1,764	1,464	..	2,507
				2	2	4,197	3,358		237	149,952	A'nand ..	2,280	1,904	..	3,407
		1	1	9	9	20,595	19,604		1,561	731,348		10,853	9,299	..	16,584

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Mussalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
2	7	139	512	1,280	1,770	16	13	1,799	7	6	5	..	11	..	99·1	54·5	1,803
54	..	46	614	965	1,500	61	18	1,579	..	..	..	..	..	..	96·1	..	1,579
22	..	..	261	840	927	125	49	1,101	..	..	3	..	3	..	88·1	..	1,104
14	..	..	804	3,676	4,404	48	28	4,480	..	8	..	..	8	..	98·9	100	4,488
32	..	112	784	571	1,241	79	35	1,355	..	..	..	..	..	..	94·0	..	1,355
34	..	101	934	834	1,677	71	24	1,772	4	..	..	..	..	..	95·9	..	1,768
20	..	100	444	1,227	1,616	96	..	1,712	41	1	..	1	2	..	94·4	100	1,673
10	..	11	852	386	1,232	10	..	1,242	4	..	..	..	..	..	99·1	..	1,238
70	10	..	942	1,008	1,872	51	32	1,955	5	70	53	11	134	..	97·3	56·9	2,084
84	..	67	1,928	291	2,122	93	4	2,219	..	9	6	..	15	..	95·8	60·0	2,234
43	..	41	1,087	814	1,763	85	53	1,901	..	..	..	..	..	..	95·4	..	1,901
385	17	617	9,162	11,892	20,124	735	256	21,115	61	94	67	12	173	..	96·5	58·4	1,633
..	..	..	..	..	....	..	..	....	..	..	..	..	..	..	..	..	....
..	..	..	25	1,197	1,088	26	108	1,222	..	..	..	..	..	..	97·7	..	1,222
340	..	249	1,506	1,003	2,475	34	2	2,511	2	71	12	..	83	..	98·6	85·5	2,592
18	..	33	447	930	1,287	50	42	1,379	2	..	..	..	..	..	96·2	..	1,377
358	..	282	1,978	3,130	4,850	110	152	5,112	4	71	12	..	83	..	97·7	85·5	1,297
2,965	21	3,996	38,288	43,095	77,888	2,759	1,368	82,015	632	370	208	28	606	..	96·6	64·0	1,607
282	161	79	1,196	621	1,707	79	33	1,819	2	112	127	64	303	..	95·5	46·8	2,120
53	5	84	727	256	944	37	7	988	5	..	..	..	..	..	96·2	..	983
30	..	49	892	1,198	2,046	36	9	2,091	1	12	2	..	14	..	98·2	85·7	2,104
32	3	11	821	613	1,408	27	6	1,441	7	15	..	..	15	..	98·1	100	1,449
72	13	152	986	412	1,364	24	12	1,400	2	22	2	2	26	..	98·2	91·6	1,424
155	2	33	1,508	401	1,887	36	..	1,923	14	19	8	..	27	..	98·1	70·3	1,936
19	..	59	427	976	1,314	69	20	1,403	..	28	2	1	31	..	95·0	93·3	1,434
27	19	52	1,057	324	1,308	8	5	1,381	..	5	1	1	7	..	99·4	83·3	1,388
116	2	118	1,031	497	1,461	66	1	1,528	..	10	..	..	10	..	95·6	100	1,538
786	205	637	8,645	5,298	13,499	382	93	13,974	31	223	142	68	433	..	97·2	61·0	1,597
810	71	175	1,551	1,158	2,668	24	24	2,716	7	5	1	1	7	..	99·1	83·3	1,358
131	..	53	642	176	795	15	11	821	3	..	..	..	..	..	98·1	..	1,512
46	..	108	515	177	674	11	10	695	3	..	1	1	2	..	98·3	..	
50	..	62	313	462	763	22	2	787	12	2	1	..	3	..	97·1	66·6	1,664
62	..	78	441	381	809	15	6	830	8	53	8	3	64	..	98·1	86·8	
333	..	180	1,524	420	1,898	32	17	1,947	3	..	..	1	1	..	98·3	..	1,945
1,432	71	656	4,986	2,774	7,607	119	70	7,796	36	60	11	6	77	..	98·4	84·5	1,567
201	..	272	2,008	554	2,470	83	13	2,566	4	40	15	..	55	..	96·7	72·7	2,617
229	1	197	1,306	818	2,123	1	..	2,124	..	..	..	..	..	..	99·9	..	2,124
119	..	98	1,597	575	2,147	23	2	2,172	..	13	4	..	17	..	98·9	76·4	2,189
163	..	420	2,746	919	3,551	115	23	3,689	24	49	2	2	53	..	96·8	96·0	3,718
157	2	211	1,729	488	2,176	52	3	2,231	14	116	115	17	248	..	97·6	50·2	2,465
417	..	304	1,998	1,230	3,145	66	20	3,231	3	52	4	1	57	..	97·9	92·8	1,642
414	..	363	2,123	2,061	4,125	71	13	4,209	25	8	3	2	13	..	98·3	72·7	2,098
1,700	3	1,865	13,507	6,645	19,737	411	74	20,222	70	278	143	22	443	..	97·9	66·0	2,288

1	2	3		4		5		6		7	8					
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state, in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary				
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.					A.				
												Sex.				
												Males.	Females.	Christian.	Hindu.	
Eastern Gujerat Circle—*concluded.*	Mancherji Beramji Colah, M. D.	1	1	1	1	2,418	1,680	Panch Mahals.	678	63,379	Godhrá ..	1,120	1,151	..	2,144	
				1	1	3,083	3,112		325	63,513	Dohad ..	1,191	1,175	..	2,208	
				1	1	1,232	1,331		153	40,505	Kálol ..	571	555	..	1,026	
				1	1	1,263	1,932		375	25,926	Hálol ..	658	576	..	1,201	
				1	1	2,125	1,643		200	36,785	Jhálod ..	1,062	960	..	1,929	
		1	1	5	5	10,121	9,698		1,731	230,108		4,602	4,417	..	8,508	
				2	2	3,596	3,251	Rewá Kántá States.	1,230	120,121	Rájpipla ..	1,830	1,766	..	3,509	
				2	2	3,570	4,067		813	49,530	Bária ..	1,760	1,805	..	3,141	
				1	2	1,293	2,656		390	74,813	Lunáwará ..	653	623	..	1,199	
				1	1	1,261	599		355	49,675	Sunth ..	628	633	..	1,206	
						....	407		196	15,221	Karána ..	..	..	..	..	
				2	1	1,204	969		820	62,913	Chota Udepur ..	568	636	..	1,185	
				1	1	768	1,150		150	41,984	Bálásinor ..	416	347	..	667	
				1	1	430	774		639	88,584	Sánkhera Mewas.	214	215	..	419	
		..	..	10	10	12,127	13,873		4,593	502,841		6,069	6,025	..	11,326	
				..	..	5,918	5,184	Máhi Kántá.	....	271,698	Náui Márwar ..	3,051	2,865	..	5,171	
				..	..	1,114	1,089		....	42,300	Watrak Kánta ..	589	520	..	987	
				..	..	1,178	924		.. ..	41,590	Sábar Kanta ..	662	516	..	1,080	
				..	..	529	1,307		....	30,114	Rhevar ..	262	267	..	446	
				..	..	1,299	....		....	22,876	Katosan ..	704	593	..	1,120	
				..	..	182	952		....	31,729	Bávesi ..	97	85	..	159	
			..	5	5	10,220	9,456		4,000	440,307		5,365	4,846	..	8,963	
				1	1	2,156	2,684	Cambay ..	350	83,494	Cambay ..	1,129	1,017	..	1,804	
				1	1	3,622	3,663	Dharampur.	225	74,592	Dharampur ..	1,864	1,758	..	3,124	
				1	1	1,733	2,127	Bánsdá ..	325	32,154	Bánsdá ..	847	886	..	1,651	
				..	..	338	547	Sachin ..	65	17,103	Sachin ..	170	168	..	218	
				..	..	353	199	Jambughora	143	6,837	Jambughora ..	171	182	..	353	
		..	..	3	3	8,202	9,225		1,108	214,180		4,181	4,011	..	7,150	
Total of Eastern Gujerat Circle.		4	4	46	46	83,478	86,151		15,939	3,002,260		42,118	39,253	27	70,420	
Western Gujerat Circle.	A. M. Blomfield, Surgeon-Major Officiating.			2	2	5,035	5,467	Ahmedabad Collectorate.	2	116,873	Ahmedabad city .	2,299	2,191	34	3,154	
				1	1	1,767	1,782		306	130,610	Daskroi ..	943	824	..	1,538	
				2	2	2,984	3,034		650	92,521	Dholka ..	1,504	1,412	..	2,337	
				3	2	4,582	4,117		1,203	112,392	Dhánduka ..	2,339	2,132	1	3,812	
				2	2	3,419	3,321		655	102,383	Viramgam ..	1,731	1,634	2	2,923	
				1	1	2,384	2,298		356	66,000	Sánand ..	1,214	1,098	..	1,961	
				1	1	2,033	1,873		266	62,731	Parantej ..	918	876	..	1,474	
									180	35,862	Morása Petha ..					
				1	1	1,334	1,385		223	24,258	Gogo ..	633	666	..	1,073	
		1	1	13	12	23,538	23,277		3,841	749,630		11,581	10,833	37	18,272	
				1	1	2,440	2,438	Sorath Prant.	.. ..	.. ..	Junágarh ..	1,229	1,205	..	1,894	
				1	1	1,737	2,433		....	....	Una ..	866	866	..	1,416	
				1	1	2,474	1,327		.. ..	.. ..	Veráwal ..	1,199	1,190	..	1,936	
				1	1	2,438	1,142		....	....	Mángrol ..	1,241	1,197	..	2,015	
				1	1	2,483	2,436		....	....	Jáfrabád ..	1,293	1,160	..	2,026	
				1	1	1,876	2,007		....	....	Porbandar ..	955	920	..	1,551	
				1	1	2,715	2,443		.. ..	.. ..	Bántwá ..	1,396	1,319		1,850	
				1	1	2,395	2,090		....	....	Bagasra ..	1,169	1,221	..	2,077	
				1	1	2,833	2,526		....	....	Jetpur ..	1,492	1,341	..	2,357	
				1	1	1,397	1,868		....	....	Drafa ..	706	638	..	1,164	
				10	10	22,788	20,710		5,488	645,570		11,546	11,057	..	18,286	

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
14	..	113	911	1,360	2,247	37	16	2,300	29	138	5	4	147	..	98·3	96·5	2,418
95	..	63	889	1,477	2,355	29	3	2,387	21	570	142	5	717	..	98·7	80·0	3,083
38	..	62	687	439	1,116	24	6	1,146	20	90	12	4	106	..	97·8	88·2	1,232
16	1	16	591	643	1,221	9	6	1,236	2	29	..	..	29	..	99·2	100	1,263
32	..	61	889	1,133	1,988	41	24	2,053	31	66	25	12	103	..	97·9	72·5	2,125
195	1	315	3,967	5,052	8,927	140	55	9,122	103	893	184	25	1,102	..	98·4	82·9	2,024
30	1	56	1,103	2,493	3,528	134	14	3,676	80	..	..	..	..	..	96·3	..	1,798
17	..	407	960	2,605	3,512	35	21	3,568	3	5	..	..	5	..	99·0	100	1,785
12	..	65	356	920	1,248	28	6	1,282	6	20	2	..	22	..	97·8	90·9	1,298
34	..	21	232	1,949	1,238	21	3	1,262	1	..	..	..	..	..	98·3	..	1,261
..	..	..	..	..	..	..	..	....	..	..	..	..	..	..	..	..	
16	..	3	387	817	1,119	62	28	1,209	5	..	..	..	..	..	94·7	..	602
42	..	54	325	438	692	50	25	767	4	4	1	..	5	..	93·2	80·0	768
4	..	6	144	285	408	13	8	429	..	..	1	..	1	..	96·9	..	430
155	1	612	3,507	8,587	11,745	343	105	12,193	99	29	4	..	33	..	97·1	87·8	1,212
315	..	430	2,560	3,356	5,809	95	25	5,929	13	2	..	..	2	..	98·3	100	..
42	..	80	455	654	1,075	33	3	1,111	2	5	..	..	5	..	97·0	100	..
45	..	53	298	880	1,172	14	..	1,186	8	..	..	..	..	..	98·8	..	..
6	..	77	276	253	529	..	..	529	..	..	..	..	..	..	100	..	..
58	..	119	524	773	1,191	97	10	1,298	1	1	1	..	2	..	92·4	50·0	..
4	..	19	93	89	167	4	11	182	..	..	..	..	..	..	97·6	..	..
470	..	778	4,206	6,005	9,943	243	49	10,235	24	8	1	..	9	..	97·6	88·8	2,044
193	4	145	1,594	552	2,137	22	1	2,160	14	9	1	..	10	..	98·9	90·0	2,156
8	..	490	560	3,062	3,593	29	..	3,622	..	..	..	..	..	..	99·1	..	3,622
4	..	78	324	1,409	1,687	19	27	1,733	..	..	..	..	..	..	98·8	..	1,733
54	..	66	197	141	327	11	2	340	2	..	..	..	..	..	96·7	..	338
..	..	..	145	208	353	1	..	354	1	..	..	..	..	..	99·7	..	353
259	4	779	2,820	5,372	8,097	82	30	8,209	17	9	1	..	10	..	98·9	90·0	2,503
4,997	285	5,642	41,638	39,733	79,555	1,720	476	81,751	380	1,500	486	121	2,107	..	97·8	75·5	1,814
1,032	12	253	3,600	890	4,399	35	70	4,504	14	468	55	24	547	2	99·2	89·4	2,517
93	..	136	1,129	638	1,680	66	56	1,802	35	..	..	..	..	..	96·2	..	1,767
231	..	348	2,402	514	2,736	26	160	2,922	6	42	17	9	68	.	99·0	71·1	1,492
365	..	293	2,597	1,874	4,316	86	101	4,503	32	62	30	22	114	3	98·0	67·3	1,527
242	1	197	2,230	1,135	3,171	98	137	3,406	41	34	3	17	54	..	97·0	91·8	1,709
141	..	210	1,644	668	2,207	89	44	2,340	28	49	20	3	72	..	96·1	71·0	2,384
131	..	189	1,307	487	1,717	76	1	1,794	..	197	37	5	239	..	95·2	84·1	2,033
115	..	111	1,021	278	1,222	56	24	1,302	3	16	19	..	35	..	95·6	45·7	1,334
2,350	13	1,742	15,930	6,484	21,448	532	593	22,573	159	868	181	80	1,129	5	97·5	82·7	1,810
405	..	135	1,458	976	2,434	12	..	2,446	12	5	1	..	6	..	99·5	83·3	2,440
239	..	77	791	941	1,727	5	..	1,732	..	5	..	..	5	..	99·7	100	1,737
174	..	279	857	1,532	2,140	30	244	2,414	25	65	1	19	85	..	98·6	98·5	2,474
320	..	103	638	1,800	2,392	..	46	2,438	..	..	..	..	..	..	100	..	2,438
277	..	150	1,838	1,115	2,295	138	20	2,453	..	18	10	2	30	..	94·3	64·2	2,433
144	..	180	475	1,400	1,835	39	2	1,876	1	1	..	..	1	..	97·9	100	1,876
730	..	135	704	2,011	2,671	28	16	2,715	..	..	..	..	..	..	98·9	..	2,715
151	..	162	716	1,674	2,370	20	..	2,390	..	2	1	2	5	..	99·1	66·6	2,395
326	..	150	1,404	1,429	2,632	96	105	2,833	..	..	..	..	..	..	96·4	..	2,835
138	..	42	390	954	1,280	53	26	1,359	15	44	..	9	53	..	96·0	100	1,397
2,904	..	1,413	8,771	13,832	21,776	421	459	22,656	53	140	13	32	185	..	99·0	91·5	2,278

1	2	3		4		5		6		7	8					
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary				
												A.				
												Sex.				
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.					Males.	Females.	Christian.	Hindu.	
Western Guzerat Circle—*concluded.*	A. M. Blomfield, Surgeon-Major; Officiating.			1	1	2,520	2,425	Jhálawad Prant.			Dhrangadra	1,300	1,199	..	2,291	
				1	1	2,082	1,838				Wánkáner ..	1,097	985	..	1,572	
				1	1	2,944	2,528				Wadhwan ..	1,492	1,411	..	2,596	
				1	1	2,337	2,431				Sayla ..	1,118	1,051	..	1,916	
				1	1	2,067	2,263				Jhinjhuwárá.	1,122	945	..	1,793	
				5	5	11,950	11,485		3,793	380,330		6,129	5,591	..	10,168	
				1	1	2,914	2,757	Hállar Prant.			Nawánagar ..	1,529	1,385	4	2,220	
				1	1	2,562	2,443				Khambhália	1,300	1,262	..	2,053	
				1	1	2,132	2,184				Bhanwád ..	1,056	1,047	..	1,648	
				1	1	2,599	2,362				Dhrol ..	1,314	1,283	..	1,963	
				4	4	10,207	9,746		3,966	359,370		5,199	4,977	4	7,884	
				1	1	2,215	2,323	Gohelwad Prant.			Pálitána ..	1,125	1,082	..	1,943	
				1	1	2,401	2,400				Wala	1,213	1,184	..	2,159	
				1	1	2,523	2,690				Jasdán ..	1,300	1,206	..	2,194	
				3	3	7,139	7,413		1,997	203,209		3,638	3,472	..	6,296	
				1	1	2,128	2,711	Limri.	281	45,940	Limri ..	1,100	1,012	..	1,839	
				1	1	2 349	1,385	Gondal.			Gondal ..	1,186	1,123	..	2,057	
				1	1	2,160	2,470				Dhoráji ..	1,071	1,077	..	1,810	
				2	2	4,509	3,855		699	94,959		2,257	2,200	..	3,867	
				2	2	4,200	4,780	Rajkot.	269	36,770	Rájkot ..	2,116	1,900	6	3,203	
				1	1	2,098	1,602	Bhaunagar.			Bhaunagar ..	1,039	1,046	6	1,734	
				1	1	2 646	2,569				Mahuwa ..	1,341	1,273	..	2,340	
				1	1	2,203	2,253				Kundla ..	1,164	975	..	1,896	
				1	1	2,565	1,903				Botád ..	1,322	1,194	..	2,201	
				1	1	2,543	1,683				Sihor ..	1,314	1,197	..	2,230	
				1	1	2,187	2,352				Talája ..	1,037	1,101	...	1,845	
				6	6	14,242	12,362		2 784	399,688		7,217	6,786	6	12,246	
				1	1	2,921	3,550	Morvi.	1,062	90,616	Morvi ..	1,531	1,390	..	2,389	
		2	2	34	34	80,084	76,612		20,389	2,256,452		40,733	38,385	16	66,178	
				3	3	7,512	6,159	Pálanpur States.	2,384	215,972	Pálanpur ..	3,899	3,613	85	6,072	
				1	1	1,814	2,387		929	91,579	Rádhanpur ..	939	875	..	1,550	
				1	1	1,732	1,881		1,004	67,591	Tharád ..	855	877	..	1,477	
				1	1	1,302	1,362		877	60,647	Morwára ...	712	586	..	1,124	
				1	1	2,221	1,825		847	66,797	Kankrej ..	1,149	1,072	..	1,997	
		..	..	7	7	14,581	13,614		6,041	502,586		7,554	7,023	85	12,220	
Total of Western Guzerat Circle.		3	3	54	53	118,203	113,503		30,221	3,508,668		59,868	56,241	138	96,670	

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste			Age.		Result.												
Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator
97	..	111	792	1,707	2,385	58	59	2,502	3	14	6	1	21	..	97·6	70·0	2,520
415	..	95	1,285	797	1,951	6	125	2,082	..	..	..	..	..	..	99·6	..	2,082
95	..	212	1,932	971	2,762	134	14	2,910	7	27	11	3	41	..	95·3	71·0	2,944
103	..	150	1,045	1,124	2,111	32	26	2,169	..	150	9	9	168	..	98·5	94·3	2,337
114	..	160	1,134	933	2,037	25	7	2,069	2	..	..	..	..	..	98·7	..	2,067
824	...	728	6,188	5,532	11,246	255	231	11,732	12	191	26	13	230	..	97·7	88·0	2,390
514	..	176	728	2,186	2,831	58	25	2,914	..	..	..	..	..	..	97·9	..	2,914
322	..	187	926	1,636	2,252	240	70	2,562	..	..	..	..	..	..	90·3	..	2,562
271	..	184	868	1,235	1,798	246	59	2,103	..	13	15	1	29	..	87·9	46·4	2,132
485	..	149	868	1,729	2,353	165	101	2,619	22	2	..	..	2	..	93·4	100	2,599
1,592	..	696	3,390	6,786	9,234	709	255	10,198	22	15	15	1	31	..	92·8	50·0	2,551
124	..	140	885	1,322	2,021	80	106	2,207	..	6	1	1	8	..	96·1	85·7	2,215
139	..	99	1,567	830	2,343	44	10	2,397	..	3	1	..	4	..	98·1	75·0	2,401
195	..	117	1,620	886	2,428	75	13	2,516	10	11	6	..	17	..	97 0	64·7	2,523
458	..	356	4,072	3,038	6,792	199	129	7,120	10	20	8	1	29	..	97·1	71·4	2,379
96	4	173	1,010	1,102	2,005	114	3	2,122	10	7	9	..	16	..	94·6	43·7	2,128
170	..	82	687	1,622	2,225	64	20	2,309	..	22	15	3	40	..	97·2	59·4	2,349
242	..	96	850	1,298	1,978	158	82	2,218	70	3	9	..	12	..	92·6	25·0	2,160
412	..	178	1,537	2,920	4,203	222	102	4,527	70	25	24	3	52	..	94·9	51·0	2,254
602	6	199	2,207	1,809	3,775	156	107	4,038	22	132	42	10	184	..	96·0	75·8	2,100
200	2	143	844	1,241	1,932	62	95	2,089	4	4	8	1	13	..	96·8	33·3	2,098
224	..	50	1,056	1,558	2,526	103	8	2,637	23	10	22	..	32	..	96·0	31·2	2,646
136	..	107	783	1,356	1,825	179	139	2,143	4	30	23	11	64	..	91·0	56·6	2,203
197	..	118	1,115	1,401	2,333	71	118	2,522	6	38	6	5	49	..	97·0	86·3	2,565
174	..	107	648	1,863	2,389	67	60	2,516	5	17	13	2	32	..	97·2	56·6	2,543
171	2	120	1,357	781	1,879	112	147	2,138	..	43	3	3	49	..	94·3	93·4	2,187
1,102	4	645	5,803	8,200	12,884	594	567	14,045	42	142	75	22	239	..	95·5	65·4	2,373
394	..	138	1,381	1,540	2,643	130	151	2 924	3	..	..	..	..	..	95·3	..	2,921
8,384	14	4,526	34,359	44,759	74,558	2,800	2,004	79,362	244	672	212	82	966	..	96·3	76·0	2,355
595	9	751	4,287	3,225	7,169	198	145	7,512	..	..	..	..	..	..	97·3	..	2,504
118	..	146	925	889	1,386	182	246	1,814	..	..	..	..	..	..	88·3	..	1,814
34	..	221	1,032	700	1,717	..	20	1,737	5	..	..	..	..	..	100	..	1,732
114	..	60	773	525	1,116	46	163	1,325	27	..	1	3	4	..	96·0	..	1,302
87	..	137	1,872	349	1,982	39	202	2,223	2	..	..	..	..	..	97·9	..	2,221
948	9	1,315	8,889	5,688	13,370	465	776	14,611	34	..	1	3	4	..	96·6	..	2,083
11,682	36	7,583	59,178	56,931	109,376	3,797	3,373	116,546	437	1,540	394	165	2,099	5	96·6	79·6	2,188

1	2	3		4		5		6		7	8				
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated.		Collectorate, political agency, or native state in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary			
												A.			
												Sex.			
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.					Males.	Females.	Christian.	Hindu.
Sind Circle.	J. Williams, M.D., Surgeon.			..	1	..	530	Kurrachee Collectorate.	946	5,631	Kurrachee ..	..	..	..	..
				1	1	3,089	4,301		20	53,526	Do. Town..	1,074	711	131	278
				..	..	..	..		2,652	4,432	Kohistan ..	..	..	..	..
				1	1	4,174	3,976		747	66,350	Dádu.. ..	766	738	..	114
				1	1	1,932	1,547		925	49,998	Sehwan ..	603	486	..	118
				1	1	1,293	202		582	18,551	Mánjhanda..	525	482	..	272
						1,353	2,351		839	23,643	Kotri.. ..	559	503	3	239
				1	1	2,161	1,269		1,322	28,260	Tatta.. ..	870	764	..	80
				1	1	839	1,326		1,284	22,646	Sákro ..	332	298	..	46
						1,087	1,212		642	29,212	Ghorabári ..	451	439	..	51
				..	..	1,690	..		294	28,471	Belo.. ..	815	701	..	118
				1	1	1,028	1,747		333	28,799	MirpurBatoro	467	404	..	54
				1	1	1,301	2,442		543	22,725	Játi	472	447	..	87
				1	1	725	1,353		2,962	21,046	Sháhbandar .	374	325	..	56
		1	2	9	10	20,622	22,256		14,091	403,290		7,308	6,298	134	1,513
				1	1	3,265	3,117	Hyderabad Collectorate.	414	61,009	Hyderabad ..	863	692	..	238
				1	1	2,309	2,003			35,272	Do. City ..	635	632	22	687
				1	1	702	684		684	30,445	Dero Mohbat	121	97	..	7
				1	1	1,331	1,607		989	56,559	Guni	379	289	..	48
				1	1	7,863	3,339		709	47,922	Bágo Tando .	1,166	1,079	..	192
				1	1	7,986	7,546		795	51,593	Badin ..	821	782	..	136
				1	1	2,024	2,647		705	55,833	TandoAlahyar	409	325	..	143
						1,646	..		561	21,169	Mirpur Khás	272	238	..	93
				1	1	4,470	3,363		531	74,141	Hála	909	691	..	249
				1	1	4,101	3,974		724	55,707	Shahdádpur .	575	480	..	140
				1	1	3,023	2,607		1,390	53,566	Sakrand ..	706	605	..	117
				1	1	3,150	2,318		704	45,551	Moro.. ..	591	472	..	174
				1	1	3,598	3,123		531	70,492	Naushahro ..	1,425	1,182	..	484
				1	1	3,315	3,930		315	47,768	Kandiáro ..	863	817	..	279
		1	1	13	13	48,788	40,258		9,052	707,027		9,735	8,381	22	2,987
				1	1	580	3,980	Thar and Párkar.	8,508	31,799	Nagar ..	205	172	..	80
				1	1	2,446	3,261			20,459	Mitti.. ..	354	307	..	97
				1	1	3,570	2,147			14,524	Dipla. ..	573	449	..	130
				1	1	4,632	3,714		1,107	32,948	Umarkot ..	815	618	..	215
				1	1	6,031	3,978			27,847	Cháchra ..	769	678	..	392
				1	1	2,463	310		3,114	24,764	Khiprá ..	891	758	..	102
						479	1,584			17,956	Sánghar ..	146	113	..	3
		1	1	6	6	20,201	19,004		12,729	160,297		3,753	3,095	..	1,019
				2	2	5,734	4,175	Shikarpur Collectorate.	472	73,383	Shikarpur ..	1,228	1,082	..	1,035
				2	2	5,581	4,029		278	60,223	Sukkur ..	1,293	1,046	14	692
				1	1	4,240	3,497		415	48,226	Naushahro ..	712	672	..	137
				2	2	2,673	2,896		1,549	66,451	Rohri ..	982	824	..	485
				1	1	..	1,215		167	20,488	Saidpur ..	..	..	..	..
						3,841	2,557		372	46,406	Ghotki ..	699	664	..	224
				1	1	2,513	4,010		1,721	42,127	Mirpur ..	733	656	..	109
				1	1	2,530	5,401		450	42,043	Ubauro ..	631	456	..	74
				1	1	3,916	2,729		291	68,399	Lárkána ..	935	734	..	249
				1	1	3,065	2,131		943	73,329	Kambar ..	687	632	..	249
				1	1	1,508	1,429		228	35,896	Ratodero ..	465	386	..	122
						1,382	1,013		192	15,107	Sijáwal ..	459	401	..	47
				1	1	3,933	466		207	31,201	Labdarya .	667	629	..	217
				1	1	5,178	..		282	31,996	Mehar ..	628	564	..	103
						1,077	3,940		301	29,023	Tigar.. ..	128	129	..	26
				1	1	3,369	1,940		602	46,443	Kakar ..	510	401	..	114
				..	..	..	1,760		343	33,597	Nasirabad ..	..	..	..	..
		2	2	16	16	50,540	43,188		8,813	764,338		10,737	9,276	14	3,883

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman.	Pársi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1,240	38	98	906	879	1,512	54	224	1,790	5	883	172	324	1,379	75	96·5	83·6	3,089
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1,375	..	15	814	690	1,465	4	39	1,508	4	2,386	161	123	2,670	..	99·7	93·6	4,174
960	..	11	825	264	1 077	3	9	1,089	...	753	58	32	843	..	99·7	92·8	1,932
732	..	3	539	468	1,001	23	5	1,029	22	207	62	19	288	2	97·7	76·9	2,646
814	1	5	586	476	1,059	5	2	1.066	4	243	30	18	291	..	99·5	89·0	
1,542	..	12	856	778	1,630	3	3	1.636	2	482	35	10	527	..	99·8	93·2	2,161
551	..	33	317	313	619	1	10	630	..	167	16	26	209	..	99·8	91·2	1,876
747	..	92	489	401	880	..	10	890	..	134	3	10	147	..	100	97·8	
1,297	..	101	796	720	1,496	18	2	1,516	..	165	9	..	174	..	98·8	94·8	..
753	..	64	326	545	855	12	4	871	..	126	30	1	157	..	98·6	80·7	1,028
656	..	176	719	200	914	1	4	919	..	351	31	..	382	..	99·8	91·8	2,991
575	..	68	496	203	665	21	16	702	3	19	7	..	26	..	96·9	73·0	725
11,242	39	678	7,669	5,937	13,173	145	328	13,646	40	5,916	614	563	7,093	77	98·9	90·5	2,291
1,231	..	86	1,029	526	1,546	26	2	1,574	19	1,663	30	18	1,711	1	98·3	98·2	3,265
494	..	64	822	445	1,249	15	7	1,271	4	949	46	47	1,042	..	98·8	95·3	2,309
187	..	24	107	111	212	..	6	218	..	408	25	51	484	..	100	94·2	702
586	..	34	105	563	649	15	4	668	..	374	288	5	667	4	97·7	56·4	1,331
1,846	..	207	627	1,618	2,226	16	25	2,266	21	5,093	410	144	5,647	29	99·2	92·5	7,863
1,356	..	111	648	955	1,586	24	8	1,618	15	5,335	827	222	6,384	1	98·5	86·5	7,986
464	..	127	239	495	688	12	39	739	5	993	72	225	1,290	..	98·2	93·2	3,670
319	..	98	175	335	469	1	40	510	..	946	29	161	1,136	..	99·7	97·0	
1,265	..	86	764	836	1,541	22	43	1,606	6	2,170	208	500	2,878	8	98·5	91·2	4,470
793	..	122	573	482	1,033	13	15	1,061	6	2,702	291	53	3,046	..	98·7	90·2	4,101
1,138	..	56	929	382	1,301	8	7	1,316	5	1,664	24	44	1.732	15	99·3	98 5	3,028
870	..	19	385	678	1,058	1	4	1,063	..	1,895	129	63	2,087	..	99 9	93·6	3,150
2,057	..	66	1,269	1,338	2.586	27	11	2,624	17	919	38	39	996	5	96·9	96·0	3,598
1,347	..	54	1,079	601	1,668	6	11	1,685	5	1,563	29	59	1,651	16	99·6	98·1	3,315
13,953	..	1,154	8,751	9,365	17,811	186	222	18,219	103	26,674	2,446	1,631	30,751	79	98·9	91·6	3,752
151	..	146	232	145	345	5	31	381	4	118	31	54	203	..	98·5	79·1	580
293	..	271	354	307	654	2	5	661	..	1,205	405	175	1,785	..	99·6	74.8	2,446
678	..	214	578	444	1,014	1	7	1,022	..	1.844	650	54	2,548	..	99·9	73·9	3,570
831	..	387	540	893	1,403	11	19	1.433	..	2,643	371	185	3,199	..	99·2	87·6	4,632
541	..	514	763	684	1,417	21	10	1.448	1	2,966	1,248	370	4.584	..	98·5	70·3	6,031
1,144	..	403	722	927	1,640	7	2	1,649	..	753	56	5	814	..	99·5	93·0	2,942
172	..	84	169	90	257	1	1	259	..	199	17	4	220	..	99·6	92·1	
3,810	..	2,019	3,358	3,490	6,730	48	75	6,853	5	9,728	2,778	847	13,353	..	99.2	77·7	3,366
1,214	..	61	1,675	635	2,265	80	15	2,360	50	2,947	341	164	3,452	28	96·5	89 6	2,867
1,508	1	124	1,507	882	2,309	26	26	2,361	22	3,235	..	7	3,242	..	98·8	100	2,799
1,196	..	51	728	656	1,374	17	2	1,393	9	2,556	285	15	2,856	..	98·7	89·9	4,240
1,159	..	162	901	905	1,752	34	44	1,830	24	781	38	51	870	3	98·0	95·3	1,335
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
1,045	..	94	550	813	1,222	4	141	1.367	4	1,130	98	250	1,478	..	99·6	92·0	3,841
1,174	..	106	518	871	1,380	8	9	1,397	8	1,897	140	87	2,124	..	99·4	93·1	2,513
928	..	85	654	433	1,073	3	14	1,090	3	1,186	162	95	1,443	..	99·7	87·9	2,530
1,315	..	105	481	1,188	1,554	53	70	1,677	8	1,540	505	202	2,247	..	96·7	75·3	3,916
1,046	..	24	995	324	1,301	3	15	1,319	..	1,567	128	51	1,746	..	99·7	92·4	3,065
690	..	39	598	253	837	7	7	851	..	569	69	19	657	..	99·1	89·1	2,890
764	..	29	462	378	835	..	5	840	..	509	27	6	542	..	100	94·9	
1,060	..	19	489	807	1,285	2	11	1,298	2	2,320	279	38	2,637	..	99·8	89·2	3,933
1,084	..	5	833	359	1,189	1	2	1,192	..	3,816	170	..	3,986	..	99·9	95·7	6,255
226	..	5	174	83	254	..	3	257	..	736	67	17	820	..	100	91·6	
793	..	4	703	208	897	13	6	916	5	2,426	10	22	2,458	..	98·5	99·5	3,369
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
15,202	1	913	11,268	8,745	19,527	251	370	20,148	135	27,215	2,319	1,024	30,558	31	98·7	92·1	3,158

1	2	3		4		5		6		7	8				
Circle.	Name and rank of superintendent.	Number of native superintendents.		Number of vaccinators.		Total number of persons vaccinated		Collectorate, political agency, or native state in which vaccinations were performed during the year.	Square miles.	Population of area included in the last column.	Name of taluka or town.	Primary A. Sex.			
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.					Males.	Females.	Christian.	Hindu.
Sind Circle—*concluded.*	J. Williams, M. D., Surgeon.		•	1	1	2,233	2,000	Upper Sind Frontier	474	29,946	Jacobabad ..	528	456	..	93
				1	1	304	1,519		471	25,232	Kashmor ..	103	86	..	11
				1	1	1,714	1,402		968	34,807	Thul	345	321	..	129
		..	.	3	3	4,251	4,921		1,913	89,985	..	976	857	..	233
		..	..	2	2	5,547	9,699	Khairpur .	2,708	130,350	Khairpur ..	2,879	2,411	..	1,342
		..	..	..	..	..	189	Jodhpur ..	..	..	Jodhpur ..	..	..	..	..
Total of Sind Circle.		5	6	49	50	149,949	139,515		49,306	2,265,287		35,388	30,318	170	10,977
Baroda Circle.	H. Aitkins, Surgeon-Major.			1	1	2,188	1,661	Barodatown	..	112,507	Baroda Town	1,144	1,038	4	1,701
				1	1	2,060	1,670	Patan Mahal.	..	295,562	Patan Mahal	1,099	961	..	1,995
				1	1	1,572	1,377				Sidpur ..	869	703	..	1,347
				2	2	3,329	2,278	Kari ..	..	251,973	Kári ..	1,892	1,437	..	3,116
				1	1	2,029	1,457	Naosari ..	..	241,255	Naosári ..	1,049	980	..	1,751
				1	1	1,140	920				Gandevi ..	600	540	..	980
				1	1	1,531	976				Palsana ..	808	720	..	1,278
				1	1	1,921	750				Wára ..	932	989	..	1,873
				1	1	1,550	942	Pitlad ..	..	185,418	Pitlád ..	942	608	..	1,332
				1	1	1,374	902				Piploi ..	831	543	..	1,174
				1	1	3,061	2,941	Baroda States.		287,379	Kamavisi ..	1,664	1,396	..	2,798
				1	1	1,541	1,129				Ambroli ..	820	721	..	1,395
				1	1	1,215	891			142,856	Dhári ..	619	596	..	1,142
				1	1	1,365	547				Karinar ..	761	604	..	1,209
				1	1	1,682	908				Damnagar ..	891	791	..	1,582
				1	1	1,584	1,580		..	137,248	Vijápur ..	862	722	..	1,484
				1	1	2,011	1,577			85,980	Dehgaon ..	1,144	867	..	1,945
				1	1	1,963	1,814			104 939	Dhaboi ..	1,030	932	..	1,657
				1	1	1,272	1,293			79,562	Kheralu ..	670	602	..	1,168
				1	1	1,495	2,055			34,255	Senor ..	788	707	..	1,301
				1	1	1,728	1,428	Sawali ..	..	22,588	Sáwali ..	942	785	..	1,556
				1	1	1,028	699	Okhámandal	..	19,153	Okhámandal	491	524	..	739
Total of Baroda Circle.		1	1	23	23	38,639	29,795		10,767	2,000,225		20,848	17,766	4	34,518
Cutch.	Dorabji Hormasji, G.G.M.C.	1	1	12	11	5,242	3,034	Cutch ..	6,500	487,805	Cutch ..	2,685	2,474	..	3,626
Aden.	Surgeon G. W. R. Hay, M. D.	..	..	1	1	2,182	1,097	Aden ..	11	19,289	Aden ..	1,358	752	11	21
Grand Total ..		30	31	389	385	776,302	704,152		194,975	24,132,433		344,270	319,760	3,422	516,234

Details of Column 5.

Total number of persons vaccinated	776,302
Deduct persons re-vaccinated	112,272
Number of persons primarily vaccinated ..	664,030

Details of Primary Vaccinations.

Total number of operations (Col. 9 E.)	..
Deduct excess of operations over persons (Col. 9 F.)	
Number of persons vaccinated	

9										10					11		12
vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												Average number of persons vaccinated by each vaccinator.
Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
886	..	5	629	355	950	20	28	998	14	1,070	128	56	1,254	5	97·9	89·3	2,233
168	..	4	120	368	175	6	2	183	..	109	5	7	121	..	96·6	95·6	304
515	..	22	298	63	634	9	26	669	3	924	93	53	1,070	22	98·6	90·8	1,714
1,569	..	31	1,047	786	1,759	35	56	1,850	17	2,103	226	116	2,445	27	98·0	90·2	1,417
3,769	..	179	1,219	4,071	5,122	121	62	5,305	15	214	35	8	257	..	97·6	85·9	2,773.
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
49,545	40	4,974	33,312	32,394	64,122	786	1,113	66,021	315	71,850	8,418	4,189	84,457	214	98·7	89·5	3,060
311	11	155	1,109	1,073	2,013	82	88	2,183	1	4	2	..	6		96·0	66·6	2,188
40	..	25	872	1,188	1,801	176	83	2,060	..	..	..	..	..	..	91·0	..	2,060
203	..	22	289	1,283	1,387	140	45	1,572	..	..	..	..	..	..	90·8	..	1,572
170	..	43	1,727	1,602	3,061	197	71	3,329	..	..	..	..	..	..	93·9	..	1,664
237	..	41	399	1,630	1,595	246	188	2,029	..	..	..	..	..	..	86·6	..	2,029
126	10	24	387	753	1,109	17	14	1,140	..	..	..	..	..	..	98·4	..	1,140
170	29	56	492	1,036	1,355	60	113	1,528	..	1	..	2	3	..	95·7	100	1,531
6	3	39	409	1,512	1,735	143	43	1,921	..	..	..	..	..	..	92·3	..	1,921
177	..	41	418	1,132	1,471	59	20	1,550	..	..	..	..	..	..	96·1	..	1,550
60	..	140	278	1,096	1,228	103	43	1,374	..	..	..	..	..	..	92·2	..	1,374
221	..	41	1,022	2,038	2,866	77	134	3,077	17	..	1	..	1	..	97·3	..	3,061
137	..	9	416	1,125	1,417	77	47	1,541	..	..	..	..	..	..	94·8	..	1,541
65	..	8	422	793	1,174	4	37	1,215	..	..	..	..	..	..	99·6	..	1,215
156	..	..	664	701	1,012	249	104	1,365	..	..	..	..	..	..	80·2	..	1,365
41	..	59	771	911	1,637	10	45	1,692	10	..	..	..	..	..	99·3	..	1,682
58	..	47	744	840	1,312	187	85	1,584	..	..	..	..	..	..	87·5	..	1,584
66	..	..	844	1,167	1,915	60	36	2,011	..	..	..	..	..	..	96·9	..	2,011
200	..	105	1,184	778	1,831	93	38	1,962	..	1	..	..	1	..	95·1	100	1,963
76	..	28	507	765	1,143	85	44	1,272	..	..	..	..	..	..	93·0	..	1,272
163	..	31	524	971	1,341	118	36	1,495	..	..	..	..	..	..	91·9	..	1,495
73	..	98	643	1,084	1,521	157	55	1,733	6	1	..	..	1	..	90·6	100	1,728
214	1	61	329	686	846	61	122	1,029	14	12	..	1	13	..	93·2	100	1,028
2,965	54	1,073	14,450	24,164	34,770	2,401	1,491	38,662	48	19	3	3	25	..	93·5	86·3	1,679
1,531	2	..	1,916	3,243	4,714	352	93	5,159	..	56	21	6	83	..	93·0	72·7	436
1,996	9	73	371	1,739	1,716	151	275	2,142	32	48	18	6	72	..	91·9	72·7	2,182
94,739	2,653	46,982	302365	361665	636,069	18,535	13,572	668,176	4,146	90,716	14,954	7,461	113131	859	97·1	85·8	1,995

	Details of Re-vaccinations.
668,176	Total number of operations (Col. 10 D.) 113,131
4,146	Deduct excess of operations over persons (Col. 10 E.).. 859
664,030	Number of persons re-vaccinated 112,272

A.—VACCINE DEPARTMENT.

STATEMENT No. II., showing the Monthly Number and Results of the Vaccinations performed in each Circle of Superintendence in the Bombay Presidency during the Year 1875-76.

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown".	
				Successful.	Unsuccessful, including "doubtful".	Unknown.		In primary vaccination.	In re-vaccination.
Presidency Circle.	April 1875...	Whole circle.	1,280	1,208	67	18	1,293	96·7	76·0
	May ,, ...	Do.	1,442	1,373	77	15	1,465	96·5	68·6
	June ,, ...	Do.	1,250	1,143	85	30	1,258	96·6	55·1
	July ,, ...	Do.	880	759	113	24	896	89·4	75·8
	August ,, ...	Do.	586	519	59	21	599	89·8	87·5
	September ,, ...	Do.	835	729	86	26	841	92·5	61·7
	October ,, ...	Do.	1,091	948	105	47	1,100	92·5	63·3
	November ,, ...	Do.	1,343	1,206	111	45	1,362	95·6	59·7
	December ,, ...	Do.	1,751	1,588	145	37	1,770	94·2	52·7
	January 1876...	Do.	2,284	2,000	148	156	2,304	97·0	54·0
	February ,, ...	Do.	9,462	7,071	2,239	1,094	10,404	88·9	65·2
	March ,, ...	Do.	13,454	9,792	1,882	1,954	13,628	91·0	81·4
		Total...	35,658	28,336	5,117	3,467	36,920	92·9	74·5
Central Circle.	April 1875..	Whole circle.	11,565	11,260	267	97	11,624	98·0	62·0
	May ,, ...	Do.	11,730	11,410	253	161	11,824	97·9	82·9
	June ,, ...	Do.	10,676	10,366	260	154	10,780	97·5	94·4
	July ,, ...	Do.	9,300	9,042	269	96	9,407	97·2	85·8
	August ,, ...	Do.	9,529	9,321	250	82	9,653	97·5	88·6
	September ,, ...	Do.	9,906	9,673	217	86	9,976	98·2	78·3
	October ,, ...	Do.	11,614	11,329	294	81	11,704	98·1	81·0
	November ,, ...	Do.	12,370	12,157	221	99	12,477	98·6	83·2
	December ,, ...	Do.	14,061	13,785	273	78	14,136	98·5	82·7
	January 1876...	Do.	13,787	13,598	180	101	13,879	99·0	86·0
	February ,, ...	Do.	11,765	11,607	128	71	11,806	99·1	89·9
	March ,, ...	Do.	11,915	11,600	287	80	11,967	98·9	65·0
		Total...	138,218	135,148	2,899	1,186	139,233	98·3	80·6

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown".	
				Successful.	Unsuccessful, including "doubtful".	Unknown.		In primary vaccination.	In re-vaccination.
Southern Circle.	April 1875 ...	Whole circle.	10,686	9,886	462	405	10,753	96·6	45·2
	May ,, ...	Do.	10,313	9,578	426	376	10,380	96·6	49·4
	June ,, ...	Do.	8,920	8,304	329	358	8,991	96·9	55·4
	July ,, ..	Do.	9,255	8,664	375	270	9,309	96·8	57·1
	August ,, ...	Do.	9,789	9,231	315	299	9,845	97·4	61·2
	September ,, ...	Do.	8,836	8,449	228	199	8,876	97·7	67·0
	October ,, ...	Do.	10,379	9,886	266	286	10,438	97·6	66·2
	November ,, ...	Do.	10,794	10,315	263	280	10,858	97·9	66·0
	December ,, ...	Do.	11,032	10,517	308	261	11,086	97·5	60·8
	January 1876 ..	Do.	9,716	9,243	269	240	9,752	98·0	63·0
	February ,, ...	Do.	11,242	10,664	243	367	11,274	98·0	70·1
	March ,, ...	Do.	11,782	11,040	475	332	11,847	97·7	68·4
		Total...	122,744	115,777	3,959	3,673	123,409	97·4	61·4
Western Circle.	April 1875 ...	Whole circle.	7,345	6,971	262	151	7,384	96·9	51·3
	May ,, ...	Do.	7,041	6,680	272	164	7,116	96·5	42·9
	June ,, ...	Do.	7,028	6,674	253	131	7,058	96·5	44·4
	July ,, ...	Do.	5,712	5,379	228	128	5,735	95·9	55·6
	August ,, ...	Do.	5,527	5,176	291	121	5,588	94·9	68·3
	September ,, ...	Do.	5,644	5,362	277	79	5,718	95·1	88·9
	October ,, ...	Do.	6,515	6,241	283	100	6,624	95·7	72·4
	November ,, ...	Do.	6,287	6,048	220	87	6,355	96·6	70 0
	December ,, ...	Do.	6,966	6,814	147	53	7,014	97·9	78·3
	January 1876 ...	Do.	8,022	7,747	195	123	8,065	97·6	87·8
	February ,, ...	Do.	7,665	7,383	194	119	7,696	97·6	77·3
	March ,, ...	Do.	8,237	7,783	345	140	8,268	96·6	58·9
		Total...	81,989	78,258	2,967	1,396	82,621	96·6	64·0
Eastern Guzerat Circle.	April 1875 ...	Whole circle.	8,728	8,409	269	91	8,769	97·4	77·6
	May ,, ...	Do.	8,331	7,999	284	81	8,364	96·9	85·6
	June ,, ...	Do.	7,413	7,159	264	39	7,462	96·7	84·5
	July ,, ...	Do.	6,069	5,813	247	46	6,106	96·4	71·5
	August ,, ...	Do.	4,856	4,686	155	40	4,881	97·1	78·5
	September ,, ...	Do.	4,518	4,376	143	24	4,543	97·1	82·8
	October ,, ...	Do.	4,985	4,860	129	32	5,021	98·2	69·5
	November ,, ...	Do.	6,303	6,168	145	21	6,334	98·4	66·4
	December ,, ...	Do.	7,477	7,315	167	19	7,501	98·6	65·2
	January 1876 ...	Do.	7,761	7,600	141	42	7,783	98·8	50·4
	February ,, ...	Do.	8,656	8,518	110	50	8,678	99·1	83·4
	March ,, ...	Do.	8,381	8,152	152	112	8,416	98·5	71·5
		Total...	83,478	81,055	2,206	597	83,858	97·8	75·5

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown".	
				Successful.	Unsuccessful, including "doubtful"	Unknown.		In primary vaccination.	In re-vaccination.
WESTERN GUZERAT CIRCLE.	April 1875...	Whole circle.	10,318	9,611	347	391	10,349	96·8	75·0
	May ,, ...	Do.	10,937	10,247	432	298	10,977	96·4	64·8
	June ,, ...	Do.	9,731	9,029	439	292	9,760	95·5	82·0
	July ,, ...	Do.	9,266	8,504	456	378	9,338	95·2	81·0
	August ,, ...	Do.	9,105	8,431	440	279	9,150	95·2	85·7
	September ,, ...	Do.	8,474	7,828	398	292	8,518	95·3	85·7
	October ,, ...	Do.	7,960	7,441	314	252	8,007	96·1	80·8
	November ,, ...	Do.	9,686	9,155	326	243	9,724	96·8	79·2
	December ,, ...	Do.	10,826	10,282	285	286	10,853	97·6	78·5
	January 1876...	Do.	9,058	8,630	198	249	9,077	97·9	81·8
	February ,, ...	Do.	11,758	11,233	254	299	11,786	98·0	83·3
	March ,, ...	Do.	11,084	10,525	302	279	11,106	97·5	75·4
		Total...	118,203	110,916	4,191	3,538	118,645	96·6	79·6
SIND CIRCLE.	April 1875...	Whole circle.	15,114	13,002	1,361	813	15,176	98·6	84·5
	May ,, ...	Do.	15,382	13,404	1,338	713	15,455	98·6	85·1
	June ,, ...	Do.	15,149	13,711	1,111	399	15,221	98·1	87·7
	July ,, ...	Do.	12,450	11,328	741	428	12,497	98·5	90·3
	August ,, ...	Do.	10,525	9,643	683	219	10,545	98·4	88·8
	September ,, ...	Do.	9,490	8,750	619	153	9,522	98·5	89·0
	October ,, ...	Do.	10,340	9,510	630	257	10,397	98·6	88·4
	November ,, ...	Do.	11,876	10,820	787	317	11,924	98·8	88·8
	December ,, ...	Do.	10,645	9,833	533	321	10,687	99·2	91·2
	January 1876...	Do.	12,158	11,252	465	468	12,185	99·2	92·9
	February ,, ...	Do.	13,303	12,268	426	636	13,330	99·3	94·3
	March ,, ...	Do.	13,517	12,451	510	578	13,539	99·1	93·5
		Total...	149,949	135,972	9,204	5,302	150,478	98·7	89·5
BARODA CIRCLE.	April 1875...	Whole circle.	3,111	2,811	143	158	3,112	95·1	100
	May ,, ...	Do.	3,505	3,117	233	161	3,511	93·0	100
	June ,, ...	Do.	2,757	2,423	217	118	2,758	91·0	100
	July ,, ...	Do.	2,185	1,927	172	88	2,187	91·8	...
	August ,, ...	Do.	2,074	1,828	185	61	2,074	90·8	100
	September ,, ...	Do.	1,977	1,752	162	67	1,981	91·5	...
	October ,, ...	Do.	2,728	2,425	211	96	2,732	91·9	...
	November ,, ...	Do.	3,140	2,855	177	110	3,142	94·1	100
	December ,, ...	Do.	3,485	3,136	220	135	3,491	93·4	...
	January 1876...	Do.	3,850	3,519	188	144	3,851	94·9	...
	February ,, ...	Do.	4,758	4,329	237	201	4,767	94·8	100
	March ,, ...	Do.	5,069	4,667	259	155	5,081	94·7	62·5
		Total...	38,639	34,789	2,404	1,494	38,687	93·5	86·3

1	2	3	4	5			6	7	
Circle of superintendence.	Months.	District in which operations were chiefly conducted in each month.	Total number of persons vaccinated and re-vaccinated.	Results.			Total.	Average percentage successful, excluding those "unknown".	
				Successful.	Unsuccessful, including "doubtful"	Unknown.		In primary vaccination.	In re-vaccination.
CUTCH CIRCLE.	April 1875 ...	Whole circle.	136	127	9	...	136	93·3	...
	May ,, ...	Do.	346	290	37	19	346	89·1	50·0
	June ,, ...	De.	343	258	76	9	343	78·0	50·0
	July ,, ...	Do.	337	303	28	6	337	91·7	66·6
	August ,, ...	Do.	333	297	31	5	333	90·8	83·3
	September ,, ...	Do.	384	328	41	15	384	89·3	80·0
	October ,, ...	Do.	461	428	30	3	461	93·4	...
	November ,, ...	Do.	461	427	27	7	461	94·0	100
	December ,, ...	Do.	417	388	15	14	417	96·4	90·9
	January 1876 ...	Do.	445	419	20	6	445	95·6	50·0
	February ,, ...	Do.	737	699	28	10	737	96·3	80·0
	March ,, ...	Do.	842	806	31	5	842	96·6	58·3
		Total...	5,242	4,770	373	99	5,242	93·0	72·7
ADEN.	April 1875 ...	Aden.	149	129	7	17	153	94·6	100
	May ,, ...		153	129	5	19	153	96·1	100
	June ,, ...		99	78	9	16	103	89·6	...
	July ,, ...		73	62	4	9	75	93·8	100
	August ,, ...		109	81	14	17	112	85·8	66·6
	September ,, ...		114	87	15	14	116	85·7	75·0
	October ,, ...		75	48	20	9	77	70·5	...
	November ,, ...		96	70	16	11	97	80·7	100
	December ,, ...		110	92	10	8	110	90·0	100
	January 1876 ...		207	151	35	26	212	85·6	42·1
	February ,, ...		523	439	18	74	531	96·4	80·0
	March ,, ...		474	398	16	61	475	96·9	80·0
		Total...	2,182	1,764	169	281	2,214	91·9	72·7
		Grand Total...	776,302	726,785	33,489	21,033	781,307	97·1	85·8

A.—VACCINE DEPARTMENT.

STATEMENT No. III., showing Expenditure of Vaccine Department in each Circle of Superintendence in the Bombay Presidency for the Year 1875-76.

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
A.—PAID BY GOVERNMENT.	Rs. a. p.	Rs. a. p.			Rs. a. p.
SUPERINTENDENT GENERAL. Salary at Rs. 1,375 per mens. ...	15,354 0 0	15,353 3 7			
Head Clerk at Rs. 80 do. ...	960 0 0	960 0 0			
Clerk at Rs. 40 do. ...	480 0 0	480 0 0			
1 Havr. & 3 Peons, Rs. 10 & 8 each per mens.	408 0 0	408 0 0			
Travelling allowances	2,807 0 0	2,591 3 0			
Contingencies	1,320 0 0	952 14 8			
Postal charges	110 0 0	67 6 6			
Total...	21,439 0 0	20,812 11 9			
PRESIDENCY CIRCLE. Superintendent at Rs. 350 per mens.	4,200 0 0	4,200 0 0			
Conveyance allowance	360 0 0	360 0 0			
Contingencies	70 0 0	60 0 0			
Postal charges	15 0 0	7 1 0			
Total...	4,645 0 0	4,627 1 0			
CENTRAL CIRCLE. Superintendent at Rs. 825 per mens.	9,725 0 0	1,200 0 0			
6 Native Superintendents, 2 at Rs. 100 and 4 at Rs. 75 each per mens.	6,000 0 0	5,844 9 0			
2 Clerks at Rs. 40 & 25 each per mens.	780 0 0	780 0 0			
1 Havr. & 9 Peons, Rs. 10, 8, & 7 each per mens.	912 0 0	907 0 0			
Travelling allowances	2,302 0 0	359 0 0			
Contingencies	290 0 0	315 5 5			
Postal charges	400 0 0	372 1 6			
Total...	20,409 0 0	9,777 15 11			
SOUTHERN CIRCLE. Superintendent at Rs. 600 per mens.	7,200 0 0	7,200 0 0			
4 Native Superintendents, 1 at Rs. 100 & 3 at Rs. 75 each per mens...	3,900 0 0	3,453 6 10			
2 Clerks at Rs. 40 & 25 each per mens.	780 0 0	775 0 0			
1 Havr. & 7 Peons, Rs. 10, 8, & 7 each per mens.	744 0 9	743 8 0			
Travelling allowances	2,278 0 0	2,322 6 0			
Contingencies	302 0 0	376 4 0			
Postal charges	450 0 0	422 0 0			
Total...	15,654 0 0	15,292 8 10			

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
A.—Paid by Government—*contd.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Western Circle. Superintendent at Rs. 600 per mens.	7,200 0 0	7,476 15 11			
5 Native Supdts., 1 at Rs. 100 & 4 at Rs. 75 each per mens. ...	5,700 0 0	4,743 13 9			
2 Clerks at Rs. 40 & 25 each per mens.	780 0 0	780 0 0			
1 Havr. & 8 Peons, Rs. 10, 8 & 7 each per mens.	912 0 0	801 10 5			
Travelling allowances	2,302 0 0	2,351 10 0			
Contingencies	300 0 0	367 15 2			
Postal charges	200 0 0	220 10 0			
Total...	17,394 0 0	16,742 11 3			
Eastern Guzerat Circle. Superintendent at Rs. 450 per mens.	5,400 0 0	5,400 0 0			
4 Native Superintendents at Rs. 75 each per mens.	3,900 0 0	3,600 0 0			
2 Clerks at Rs. 40 & 25 each per mens.	780 0 0	769 4 0			
1 Havr. & 7 Peons, Rs. 10, 8 & 7 each per mens.	744 0 0	679 0 0			
Travelling allowances	2,278 0 0	2,250 9 0			
Contingencies	250 0 0	184 3 6			
Postal charges	300 0 0	256 5 6			
Total...	13,652 0 0	13,139 6 0			
Western Guzerat Circle. Superintendent at Rs. 600 per mens.	7,200 0 0	1,200 0 0			
3 Native Supdts. 1 at Rs. 100 & 2 at Rs. 75 each per mens... ...	3,000 0 0	2,855 1 11			
2 Clerks at Rs. 40 & 25 each per mens.	780 0 0	780 0 0			
1 Havr. & 6 Peons, Rs. 10, 8 & 7 each per mens.	660 0 0	656 10 5			
Travelling allowances	2,722 0 0	2,099 3 3			
Contingencies	276 0 0	171 9 1			
Postal charges	300 0 0	300 0 0			
2 Vaccrs. at Rs. 14 each per mens...	336 0 0	336 0 0	4,763	97·2	0 1 9
2 Peons at Rs. 7 each per mens. ...	168 0 0	166 13 11			
Contingencies	24 0 0	3 15 9			
Total...	15,466 0 0	8,569 6 4	4,763	97·2	0 1 9
Sind Circle. Superintendent at Rs. 600 per mens.	7,200 0 0	7,200 0 0			
5 Native Supdts. 1 at Rs. 130, 1 at Rs. 100, & 3 at Rs. 75 each per mens	6,360 0 0	5,036 0 0			
2 Clerks at Rs. 40 & 25 each per mens.	780 0 0	780 0 0			
1 Havr. & 9 Peons, Rs. 10, 8 & 7 each per mens.	912 0 0	828 0 0			
Travelling allowances	2,758 0 0	2,176 3 0			
Contingencies	408 0 0	283 5 6			
Postal charges	300 0 0	305 0 0			
Total...	18,718 0 0	16,608 8 6	...	...	...
Total paid by Government...	1,27,377 0 0	1,05,570 5 7	4,763	97·2	0 1 9

1		2		3		4	5	6	
		Sanctioned.		Expended.		Total number vaccinated and re-vaccinated	Percentage of success, excluding those unknown from the total.	Cost of each successful case.	
B.—Paid by Municipalities.		Rs. a. p.		Rs. a. p.				Rs. a. p	
Presidency Circle.	1 Head Vaccr. at Rs. 45 per mens.	540 0 0		540 0 0					
	6 Vaccrs. at Rs. 24 each do. ...	1,728 0 0		1,716 12 4					
	3 do. at Rs. 18 each do. ...	648 0 0		636 14 3					
	6 do. at Rs. 14 each do. ...	1,008 0 0		1,006 9 7					
	5 Peons at Rs. 9 each do. ...	540 0 0		536 7 8					
	Contingencies	3,522 2 10		2,824 14 3					
	Total...	7,986 2 10		7,261 10 1		35,658	84·7	0 4 1	
Central Circle.	1 Vaccr. at Ahmednagar, Rs. 15 do.	180 0 0		180 0 0		1,145	98·3	0 3 7	
	1 Peon at do. at Rs. 7 do. ...	84 0 0		74 12 10					
	1 Vaccr. at Khed at Rs. 15 do. ...	180 0 0		137 0 0		769	97·5	0 3 11	
	1 Peon at do. at Rs. 5 do. ...	60 0 0		49 0 0					
	Contingencies	12 0 0		1 8 0					
	2 Vaccrs. at Poona at Rs. 20 each do.	480 0 0		476 0 0		3,119	93·3	0 3 9	
	2 Peons at do. at Rs. 7 do. ...	168 0 0		168 0 0					
	Contingencies	3 0 0		3 0 0					
	1 Vaccr. at Satara at Rs. 15 per mens	180 0 0		180 0 0		1,183	97·5	0 3 3	
	1 Peon at do at Rs. 5 do. ...	60 0 0		60 0 0					
	1 Vaccr. at Sholápur at Rs. 15 do. ...	180 0 0		180 0 0		1,458	99·9	0 3 0	
	1 Peon at do. at Rs. 7 do. ...	84 0 0		84 0 0					
	Contingencies	12 0 0		6 0 6					
	1 Vaccr. at Bársi at Rs. 15 do. ...	180 0 0		180 0 0		1,383	86·3	0 3 2	
	1 Peon at do. at Rs. 6 do. ...	72 0 0		72 0 0					
	Contingencies	6 0 0		0 7 0					
	1 Vaccr. at Pandharpur at Rs. 18 do.	216 0 0		216 0 0		1,325	98·5	0 3 7	
	1 Peon do. at Rs. 6 do.	84 0 0		73 15 4					
	Contingencies	6 0 0		2 10 6					
	1 Vaccr. at Malsiras at Rs. 15 do.	180 0 0		180 0 0		889	98·2	0 4 2	
	1 Peon do. at Rs. 6 per do...	72 0 0		24 0 0					
	Contingencies	16 0 0		16 0 0					
	Total...	2,515 0 0		2,364 6 2		11,271	95·5	0 3 6	
Southern Circle.	1 Vaccr. at Belgaum at Rs. 12 do.	144 0 0		144 0 0		895	91 6	0 4 4	
	1 Peon do. at Rs. 6 do...	72 0 0		72 0 0					
	Contingencies	1 9 6		1 9 6					
	1 Vaccr. at Gokak at Rs. 15 do. ...	45 0 0		45 0 0		265	92·9	0 4 2	
	1 Peon do. at Rs. 6 do. ...	18 0 0		18 0 0					
	1 Vaccr. at Dharwar at Rs. 18 do. ...	216 0 0		215 8 0		1,134	96·5	0 4 0	
	1 Peon do. at Rs. 4 do. ...	48 0 0		48 0 0					
	Contingencies...	4 0 0		4 0 0					
	1 Vaccr. at Hubli at Rs. 15 do....	180 0 0		180 0 0		1,359	98·3	0 2 2	
	Contingencies	3 14 3		3 14 3					
	1 Vaccr. at Gadag at Rs. 15 do.	180 0 0		179 0 0		1,173	97·7	0 3 7	
	1 Peon do. at Rs. 6 do...	72 0 0		72 0 0					
	1 Vaccr. at Bágalkot at Rs. 18 do...	216 0 0		215 15 10		953	96·8	0 3 10	
	Contingencies	5 5 7		5 5 7					
	1 Vaccr. at Bijápur at Rs. 10 do.	120 0 0		120 0 0		1,360	99·4	0 2 4	
	1 Peon do. at Rs. 5 do.	60 0 0		60 0 0					
	Contingencies	12 0 0		12 0 0					
	1 Vaccr. at Guledgudd at Rs. 12 do.	144 0 0		144 0 0		1,023	97·8	0 3 6	
	1 Peon do. at Rs. 6 do.	72 0 0		72 0 0					
	Contingencies	6 0 0		6 0 0					
	Total...	1,619 13 4		1,618 5 2		8,162	97·0	0 3 4	

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated and re-vaccinated	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
B.—Paid by Municipalities—*continued.*	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Western Circle.											
1 Vaccr. at Dhuliá at Rs. 15 do.	180	0	0	180	0	0	716	100	0	4	0
1 Vaccr. at Násik at Rs. 15 do.	180	0	0	180	0	0	807	94·7	0	5	3
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0					
1 Vaccr. at Tanna at Rs. 14 do.	168	0	0	168	0	0					
1 Peon do. at Rs. 8 do.	96	0	0	80	0	0	887	88·2	0	5	5
Contingencies	.....			10	5	9					
1 Vaccr. at Panwel & Uran, Rs.18 do.	216	0	0	216	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	872	96·2	0	5	8
Total...	996	0	0	990	5	9	3,282	94·5	0	5	1
Eastern Guzerat Circle.											
1 Vaccr. at Surat, Rs. 13 & 20 do.	156	0	0	184	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	2,120	89·8	0	2	5
Contingencies...	24	0	0	24	0	0					
1 Vaccr. at Broach at Rs. 13 do.	156	0	0	156	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	811	98·9	0	4	10
Contingencies	12	0	0	12	0	0					
1 Vaccr. at Nariád at Rs. 15 do.	180	0	0	179	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,043	95·8	0	4	2
Contingencies	12	0	0	12	0	0					
Total...	756	0	0	783	0	0	3,974	93·3	0	3	5
Western Guzerat Circle.											
2 Vaccrs. at Ahmedabad, Rs. 20 each do.	480	0	0	480	0	0					
2 Peons do. at Rs. 7 each do.	168	0	0	168	0	0	5,035	98·1	0	2	2
Contingencies..	12	0	0	10	7	6					
1 Vaccr. at Dholká at Rs. 12 do.	144	0	0	142	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	657	99·4	0	6	0
Contingencies	3	0	0	3	0	0					
1 Vaccr. at Dhanduká at Rs. 15 do.	180	0	0	178	8	9					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	988	94·8	0	4	10
Contingencies	24	0	0	24	0	0					
1 Vaccr. at Viramgám at Rs. 12 do.	144	0	0	144	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	766	95·2	0	5	1
Contingencies	3	0	0	3	0	0					
Total...	1,398	0	9	1,393	0	3	7,446	97·5	0	3	1
Sind Circle.											
1 Vaccr. at Kurrachee at Rs. 15 do.	180	0	0	180	0	0					
Contingencies	75	0	0	50	2	0	3,089	91·3	0	1	6
1 Vaccr. at Hyderabad at Rs. 20 do.	240	0	0	240	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	2,309	97·3	0	2	6
Contingencies	24	0	0	24	0	0					
1 Vaccr. at Shikarpur at Rs. 30 do.	360	0	0	360	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	2,446	90·8	0	3	1
Contingencies	1	12	0	1	12	0					
1 Vaccr. at Sukkur at Rs. 20 do.	240	0	0	240	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	1,444	98·8	0	4	1
Contingencies	36	0	0	36	0	0					
1 Vaccr. at Rohri at Rs. 10 do.	120	0	0	120	0	0	503	97·1	0	4	1
Contingencies	4	9	0	4	9	0					
Total...	1,521	5	0	1,496	7	0	9,791	94·1	0	2	9

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
	Rs. a. p.	Rs. a. p.			Rs. a. p.
B.—PAID BY MUNICIPALITIES—*continued.*					
ADEN. 1 Vaccr. at Rs. 18 per mens. ...	216 0 0	216 0 0	2,182	91·2	0 1 11
TOTAL PAID BY MUNICIPALITIES...	17,008 5 2	16,123 2 5	81,766	90·8	0 3 7
C.—PAID FROM LOCAL FUNDS.					
CENTRAL CIRCLE. 1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
5 do. ,, 18 each per mens. ...	1,080 0 0	1,080 0 0			
5 do. ,, 14 ,, do. ...	840 0 9	827 11 9			
11 Peons ,, 7 ,, do. ...	924 0 0	903 0 0			
Contingencies	264 0 0	121 10 9			
Ahmednagar Zillah total...	3,396 0 0	3,220 6 6	25,706	98·8	0 2 0
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	292 10 3			
3 do. ,, 18 each per mens.	648 0 0	638 8 3			
4 do. ,, 14 ,, do.	672 0 0	666 1 7			
8 Peons ,, 7 ,, do.	672 0 0	662 3 2			
Contingencies	192 0 0	74 7 3			
Poona Zillah total...	2,472 0 0	2,333 14 6	16,267	98·3	0 2 4
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
5 do. ,, 18 each per mens.	1,080 0 0	1,079 0 0			
5 do. ,, 14 ,, do.	840 0 0	835 0 9			
11 Peons ,, 7 ,, do.	924 0 0	923 8 0			
Contingencies	264 0 0	92 1 3			
Satara Zilláh total...	3,396 0 0	3,217 10 0	27,578	98·6	0 1 10
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	278 0 0			
2 do. ,, 18 each per mens.	432 0 0	425 0 0			
4 do. ,, 14 ,, do.	672 0 0	671 0 0			
7 Peons ,, 7 ,, do.	588 0 0	587 0 0			
Contingencies	168 0 0	59 13 1			
Sholápur Zillah total...	2,148 0 0	2,029 13 1	16,154	97·5	0 2 0
1 Vaccr. at Rs. 30 per mens. ...	360 0 0	360 0 0			
5 do. ,, 18 each per mens.	1,080 0 0	1,076 0 0			
5 do. ,, 14 ,, do.	840 0 0	836 8 0			
11 Peons ,, 7 ,, do.	924 0 0	917 0 0			
Contingencies	264 0 0	75 7 5			
Ratnágiri Zillah total...	3,468 0 0	3,264 15 5	29,431	97·1	0 1 9
Circle total...	14,880 0 0	14,066 11 6	1,15,136	98·1	0 1 11

	1	2	3	4	5	6
		Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
	C.—Paid from Local Funds—*continued.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Southern Circle.	1 Vaccr. at Rs. 24 per mens. ...	288 0 0	212 8 3			
	3 do. „ 18 each per mens.	648 0 0	619 0 0			
	7 do. „ 14 „ do.	1,176 0 0	1,142 9 1			
	11 Peons „ 7 „ do.	924 0 0	912 13 11			
	Contingencies	264 0 0	89 4 5			
	Belgáum Zillah total...	3,300 0 0	2,976 3 8	22,322	97·1	0 2 2
	1 Vaccr. at Rs. 24 per mens. ...	288 0 0	257 0 0			
	5 do. „ 18 each per mens.	1,080 0 0	1,053 8 0			
	5 do. „ 14 „ do.	840 0 0	813 13 5			
	11 Peons „ 7 „ do.	924 0 0	924 0 0			
	Contingencies	264 0 0	52 13 10			
	Dharwar Zillah total...	3,396 0 0	3,101 3 3	18,726	93·4	0 2 10
	1 Vaccr. at Rs. 24 per mens. ...	288 0 0	287 0 0			
	3 do. „ 18 each per mens.	648 0 0	646 0 0			
	4 do. „ 14 „ do.	672 0 0	671 0 0			
	8 Peons „ 7 „ do.	672 0 0	670 8 0			
	Contingencies	192 0 0	89 0 9			
	Kaládgi Zillah total...	2,472 0 0	2,363 8 9	18,595	98·6	0 2 1
	1 Vaccr. at Rs. 24 per mens. ...	288 0 0	287 0 0			
	3 do. „ 18 each per mens.	648 0 0	639 0 0			
	7 do. „ 14 „ do.	1,176 0 0	1,115 8 0			
	11 Peons „ 7 „ do.	924 0 0	930 0 0			
	Contingencies	264 0 0	82 1 4			
	Kanara Zillah total...	3,300 0 0	3,053 9 4	13,676	97·2	0 3 8
	Circle total...	12,468 0 0	11,494 9 0	73,319	96·6	0 2 7
Western Circle.	1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
	7 do. „ 18 each per mens.	1,512 0 0	1,490 0 0			
	8 do. „ 14 „ do.	1,344 0 0	1,328 0 6			
	16 Peons „ 7 „ do.	1,344 0 0	1,329 8 3			
	Contingencies	384 0 0	123 7 6			
	Khándesh Zillah total...	4,872 0 0	4,559 0 3	27,500	97·7	0 2 8
	1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
	4 do. „ 18 each per mens.	864 0 0	855 0 0			
	6 do. „ 14 „ do.	1,008 0 0	1,002 0 0			
	11 Peons „ 7 „ do.	924 0 0	916 0 0			
	Contingencies	264 0 0	58 13 3			
	Násik Zillah total...	3,348 0 0	3,119 13 3	17,761	93·8	0 3 0

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*continued.*	Rs. a p.	Rs. a p			Rs. a. p.
Western Circle—*concld.*					
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	276 0 0			
2 do. ,, 18 each per mens.	432 0 0	432 0 0			
2 do. ,, 14 ,, do.	336 0 0	336 0 0			
5 Peons ,, 7 ,, do.	420 0 0	420 0 0			
Contingencies	120 0 0	51 10 10			
Colábá Zillah total...	1,596 0 0	1,515 10 10	8,787	96·6	0 2 10
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
5 do. ,, 18 each per mens.	1,080 0 0	1,080 0 0			
5 do. ,, 14 ,, do.	840 0 0	768 7 4			
11 Peons ,, 7 ,, do.	924 0 0	924 0 0			
Contingencies	264 0 0	101 3 8			
Tánná Zillah total...	3,396 0 0	3,161 11 0	19,468	96·5	0 2 8
Circle total...	13,212 0 0	12,356 3 4	73,516	96·3	0 2 9
Eastern Guzerat Circle.					
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	264 0 0			
3 do. ,, 18 each per mens.	648 0 0	629 8 0			
4 do. ,, 14 ,, do.	672 0 0	673 0 0			
8 Peons ,, 7 ,, do.	672 0 0	661 12 3			
Contingencies	192 0 0	112 15 8			
Surat Zillah total...	2,472 0 0	2,341 3 11	12,594	97·3	0 3 0
1 Vaccr. at Rs. 24 per mens ...	288 0 0	260 0 0			
1 do. ,, 18 do. ...	216 0 0	216 0 0			
2 do. ,, 14 each do.	336 0 0	313 9 4			
4 Peons ,, 7 ,, do.	336 0 0	334 0 0			
Contingencies	90 0 0	75 2 11			
Broach Zillah total...	1,272 0 0	1,198 12 3	7,026	98·2	0 2 9
1 Vaccr. at Rs. 24 per mens ...	288 0 0	288 0 0			
3 do. ,, 18 each per mens...	648 0 0	684 0 0			
4 do. ,, 14 ,, do.	672 0 0	667 15 0			
8 Peons ,, 7 ,, do.	672 0 0	671 0 0			
Contingencies	192 0 0	111 9 8			
Kaira Zillah total...	2,472 0 0	2,422 8 8	19,552	97·3	0 2 0
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
2 do. ,, 18 each per mens.	432 0 0	423 0 0			
2 do. ,, 14 ,, do.	336 0 0	332 7 0			
5 Peons ,, 7 ,, do.	420 0 0	420 0 0			
Contingencies	120 0 0	73 14 0			
Panch Máháls total...	1,596 0 0	1,537 5 0	10,474	96·9	0 2 5
Circle total...	7,812 0 0	7,499 13 10	49,646	97·4	0 2 5

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
C.—Paid from Local Funds—*continued.*	Rs. a. p.	Rs. a. p.			Rs. a. p.
Western Gujerat Circle.					
1 Vaccr. at Rs. 24 per mens ...	288 0 0	370 11 11			
2 do. ,, 18 each per mens.	648 0 0	428 0 0			
5 do. ,, 14 ,, do.	672 0 0	770 11 5			
8 do. ,, 7 ,, do.	672 0 0	637 0 0			
Contingencies	192 0 0	75 2 9			
Ahmedabad Zillah total...	2,472 0 0	2,281 10 1	16,092	96·6	0 2 4
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	288 0 0			
4 do. ,, 18 each per mens.	864 0 0	477 0 0			
4 do. ,, 14 ,, do.	672 0 0	793 14 0			
9 Peons ,, 7 ,, do.	756 0 0	646 15 3			
Superintendent's allowance ...	511 0 0	510 10 0			
Contingencies	756 0 0	597 4 8			
Kurrachee Zillah total...	3,847 0 0	3,313 11 11	17,533	96·9	0 3 2
2 Vaccr. at Rs. 24 & 30 per mens	648 0 0	586 13 0			
5 do. ,, 18 each do.	1,080 0 0	994 7 0			
5 do. ,, 14 ,, do.	840 0 0	492 2 0			
12 Peons ,, 7 ,, do.	1,008 0 0	.....			
Superintendent's allowance ...	548 10 0	548 10 0			
Contingencies	288 0 0	99 13 6			
Hyderabad Zillah total...	4,412 10 0	2,721 13 6	46,479	94·2	0 1 0
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	245 12 0			
2 do. ,, 18 each per mens.	432 0 0	193 0 0			
3 do. ,, 14 ,, do.	504 0 0	502 0 0			
9 Peons ,, 7 ,, do.	504 0 0	440 5 2			
Contingencies	144 0 0	130 1 3			
Thar and Párkar total...	1,872 0 0	1,511 2 5	20,201	85·3	0 1 6
1 Vaccr. at Rs. 24 per mens ...	288 0 0	215 10 0			
6 do. ,, 18 each per mens.	1,296 0 0	1,052 9 0			
6 do. ,, 14 ,, do.	1,008 0 0	947 2 0			
13 Peons ,, 7 ,, do.	1,092 0 0	1,091 8 6			
Superintendent's allowance ...	741 0 0	740 12 0			
Contingencies	1,092 0 0	897 13 9			
Shikárpur Zillah total...	5,517 0 0	4,945 7 3	46,147	94·8	0 1 10
1 Vaccr. at Rs. 24 per mens. ...	288 0 0	209 4 0			
1 do. ,, 18 do. ...	216 0 0	.....			
1 do. ,, 14 do. ...	168 0 0	82 13 11			
3 Peons ,, 7 each do. ...	252 0 0	177 5 11			
Contingencies	72 0 0	25 0 3			
Upper Sind Frontier total...	996 0 0	494 8 1	4,251	93·6	0 2 1
Sind Circle. Circle total...	16,644 10 0	12,986 11 2	1,34,611	93·4	0 1 8
Total paid from Local Funds...	67,488 10 0	60,685 10 11	4,62,320	96·1	0 2 2

1	2			3			4	5	6		
	Sanctioned.			Expended.			Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
D.—Paid by Native Chiefs or Landlords.	Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
Central Circle.											
1 Vaccr., Akalkot, Rs. 15 per mens.	180	0	0	180	0	0					
1 Peon do. at Rs. 6 do.	72	0	0	72	0	0	1,986	96·6	0	2	8
Contingencies	72	0	0	70	8	0					
1 Vaccr., Atpádi, Rs. 15-9-4 do.	187	0	0	187	0	0					
1 Peon do. at Rs. 5 do.	60	0	0	60	0	0	1,391	98·2	0	2	10
Contingencies	2	0	0	2	0	0					
2 Vaccrs., Bhor, Rs. 16¼ & 14 do.	363	0	0	348	0	0					
2 Peons do. at Rs. 4½ do.	108	0	0	103	8	0	5,068	99·0	0	1	6
Contingencies	48	0	0	23	0	0					
1 Vaccr., Phaltan, Rs. 15 per mens.	180	0	0	178	0	0					
1 Peon do. at Rs. 4 do.	48	0	0	48	0	0	1,775	95·3	0	2	2
1 Vaccr., Jat, Rs. 14½ per mens.	174	0	0	166	12	0					
1 Peon do. at Re. 1 do. ...	12	0	0	12	0	0	1,591	99·3	0	1	10
Contingencies	12	0	0	10	8	0					
Circle total...	1,518	0	0	1.461	4	0	11,811	98·0	0	2	0
Southern Circle.											
1 Native Supdt., Kolhápur, Rs. 75 do.	900	0	0	900	0	0					
1 Peon do. at Rs. 5 do.	60	0	0	60	0	0					
Contingencies	24	0	0	24	0	0					
1 Vaccr., Kolhápur, Rs. 25 per mens.	300	0	0	300	0	0					
1 do. do. ,, 22 do.	264	0	0	264	0	0					
1 do. do. ,, 18 do.	216	0	0	216	0	0					
4 do. do. ,, 16 each do.	768	0	0	750	0	0	19,587	98·0	0	3	5
1 do. do. ,, 15 do.	180	0	0	180	0	0					
3 do. do. ,, 14 each do.	504	0	0	502	3	1					
11 Peons do. ,, 6 ,, do.	792	0	0	698	13	6					
Contingencies	107	14	9	107	14	9					
4 Vaccrs., Sángli, Rs. 22 & 12 do.	696	0	0	559	7	9					
4 Peons do. Rs. 7 & 4-12 each do.	309	0	0	308	8	9	4,969	97·5	0	3	2
Contingencies	54	5	3	54	5	3					
2 Vaccrs., Jamkhandi, Rs. 19 & 14 do.	389	0	0	389	0	0					
2 Peons do. Rs. 7 do.	168	0	0	168	0	0	2,633	96·0	0	3	8
Contingencies	8	0	0	8	0	0					
2 Vaccrs., Miraj Sr., Rs. 15 & 12 do.	324	0	0	318	0	0					
1 Peon do. Rs. 6 do.	72	0	0	72	0	0	1,676	93·1	0	4	4
Contingencies	7	8	0	7	8	0					
1 Vaccr., Miraj (Junior), Rs. 10 do.	120	0	0	120	0	0					
1 Peon do. Rs. 5 do.	60	4	0	60	4	0	369	99·4	0	7	11
Contingencies	2	7	0	2	7	0					
1 Vaccr., Kurundwád Eld. Rs. 8 do.	96	0	0	96	0	0					
1 Peon do. at Rs. 5 do.	60	0	0	60	0	0	643	98·4	0	4	0
Contingencies	6	2	0	6	2	0					
1 Vaccr., Kurundwád Yr. Rs. 12 do.	144	0	0	144	0	0					
1 Peon do. Rs. 6 do.	72	0	0	72	0	0	878	97·0	0	4	3
Contingencies	2	14	3	2	14	3					
1 Vaccr., Mudhol, Rs. 18 per mens	216	0	0	216	0	0					
1 Peon do. Rs. 6 do...	72	0	0	69	12	11	1,569	99·8	0	2	11
Contingencies	1	5	6	1	5	6					
1 Vaccr., Rámdurg, Rs. 15 per mens.	180	0	0	169	2	0					
1 Peon do. at Rs. 4 do.	48	0	0	48	0	0	767	98·5	0	4	7
1 Vaccr., Sawánur, Rs. 15 do.	180	0	0	180	0	0					
1 Peon do. at Rs. 7 do.	84	0	0	84	0	0	796	94·9	0	5	9
1 Vaccr., Sáwant Wári, Rs. 20 do.	240	0	0	239	12	0					
5 Peons do. Rs. 6 & 9 each do.	568	0	0	404	8	0	7,376	93·0	0	1	6
Contingencies	5	0	0	5	0	0					
Circle total...	8,301	12	9	7,869	0	9	41,263	96·7	0	3	3

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
	Rs. a. p.	Rs. a. p.			Rs. a. p.
D.—Paid by Native Chiefs or Landlords—*continued.*					
Western Circle.					
1 Vaccr., Peint Rs. 17-8-0 per mens.	210 0 0	210 0 0			
1 Peon do. Rs. 7 do. ...	84 0 0	81 0 0	1,222	97·7	0 4 5
Contingencies	12 0 0	12 0 0			
2 Vaccr., Janjira, Rs. 12 each do. ..	288 0 0	252 0 0	2,592	98·2	0 1 7
1 Vaccr., Jawhár, Rs. 20 do. ...	240 0 0	240 0 0	1,377	96·3	0 2 11
Circle total...	834 0 0	795 0 0	5,191	97·6	0 2 7
Eastern Guzerat Circle.					
1 Vaccr., Rájpiplá, Rs. 18-6-0 do.	220 8 0	220 8 0			
1 do. do. Rs. 15-12-0 do.	189 0 0	189 0 0	3,596	96·3	0 2 4
2 Peons do. Rs. 4-6-0 & 4 do.	100 8 0	100 8 0			
Contingencies	5 4 0	5 4 0			
1 Vaccr., Deogarh Báriá, Rs. 20 do.	240 0 0	220 0 0			
1 do. do. Rs. 18 do.	216 0 0	216 0 0	3,570	99·0	0 2 6
2 Peons do. Rs. 5-4-0 each do.	126 0 0	126 0 0			
Contingencies	5 4 0	5 4 0			
1 Vaccr., Lunawárá, Rs. 18 do.	216 0 0	228 0 0			
1 Peon do. Rs. 5¼ do.	63 0 0	68 4 0	1,298	97·6	0 3 9
Contingencies	2 10 0	2 10 0			
1 Vaccr., Sunth & Karáná, Rs. 18 do.	216 0 0	211 0 0			
1 Peon do. Rs. 5-4-0 do.	63 0 0	63 0 0	1,261	98·3	0 3 6
Contingencies	2 10 0	2 10 0			
1 Vaccr., Chotá Udopur, Rs. 18 do.	216 0 0	211 0 0			
1 do. do. Rs. 14 do	168 0 0	124 3 2			
2 Peons do. Rs. 5-4-0 each do.	126 0 0	98 14 5	1,204	94·7	0 6 3
Contingencies	5 4 0	5 4 0			
1 Vaccr., Bálásinor, Rs. 13-2-0 do.	157 8 0	157 8 0			
1 Peon do. Rs. 3-8-0 do.	42 0 0	42 0 0	763	93·1	0 4 7
1 Contingencies	2 10 0	2 10 0			
1 Vaccr., Sankherá Mewás, Rs. 18 do.	216 0 0	171 0 0			
1 Peon do. Rs. 5-4-0 do.	63 0 0	63 0 0	430	96·6	0 9 3
Contingencies	2 10 0	2 10 0			
2 Vaccrs., Edar, at Rs. 20 each do.	480 0 0	480 0 0			
2 Peons do. Rs. 5 & 6 do.	132 0 0	132 0 0	4,053	97·7	0 2 6
Contingencies	24 0 0	24 0 0			
3 Vaccrs, Máhi Kantá Thakurs. Rs. 20 each per mens.	720 0 0	720 0 0	6,167	97·4	0 2 0
Contingencies	36 0 0	36 0 0			
1 Vaccr., Cámbay, at Rs. 20 do.	240 0 0	240 0 0	2,156	98·9	0 2 2
1 Peon do. at Rs. 4-8-0 do.	54 0 0	54 0 0			
1 Vaccr., Dharampur, Rs. 15 do.	180 0 0	180 0 0			
1 Peon do. at Rs. 6 do.	72 0 0	72 0 0	3,622	99·1	0 1 2
Contingencies	18 0 0	14 3 6			
1 Vaccr., Bánsdá, Rs. 15 do.	180 0 0	177 0 0			
1 Peon do. Rs. 6 do.	72 0 0	72 0 0	1,733	98·8	0 2 5
Contingencies	18 0 0	11 4 9			
Circle total...	4,890 12 0	4,748 9 10	29,858	97·7	0 2 7

	1	2			3			4	5	6		
		Sanctioned.			Expended.			Total number vaccinated and re vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.		
		Rs.	a.	p.	Rs.	a.	p.			Rs.	a.	p.
	D.—Paid by Native Chiefs or Landlords—*continued.*											
Western Guzerat Circle.	2 Vaccrs., Pálanpur, Rs. 22 & 15 do.	444	0	0	444	0	0					
	2 Peons do. Rs. 5 each do.	120	0	0	120	0	0					
	Contingencies	12	0	0	12	0	0					
	1 Vaccr., Ràdhanpur, Rs. 18 do.	216	0	0	198	0	0					
	1 Peon do, Rs. 5 do.	60	0	0	60	0	0					
	1 Vaccr. by Thakurs of Tharad, Warahi, Wao, Santálpur, Chadchat, Bhabhar, Diodar, Terwára, Morwára, Suigam and Kankrej, Rs. 22 do. ...	264	0	0	264	0	0					
	1 Peon do. Rs. 5 do. ...	60	0	0	60	0	0					
	2 Vaccrs. by Fine Fund of Pálanpur, Rs. 22 & 18 do. ...	456	0	0	456	0	0					
	2 Peons do,, Rs. 6 each do. ...	144	0	0	144	0	0					
	Pálanpur States total...	1,776	0	0	1,758	0	0	12,145	95·9	0	2	6
	Paid by Kattywar Chiefs.											
	1 Vacr. at Rs. 30 per mens. ...	360	0	0	360	0	0					
	1 do. ,, 25 do. ...	600	0	0	430	0	0					
	2 do. ,, 20 each do. ...	480	0	0	440	0	0					
	5 do. ,, 18 ,, do. ...	1,080	0	0	1,076	0	0					
	7 do. ,, 15 ,, do. ...	1,260	0	0	1,154	6	0					
	17 do. ,, 14 ,, do. ...	2,856	0	0	2,798	15	11					
	33 Peons ,, 7 ,, do. ...	2,856	0	0	2,720	10	4					
	Candidates, Rs. 4 each ...do. ...	140	0	0	140	0	0					
	Supdt's. allowance, Rs. 50 do. ...	600	0	0	600	0	0					
	4 Agents, Rs. 5 each do. ...	240	0	0	240	0	0					
	Accountant, Rs. 20 do. ...	240	0	0	240	0	0					
	Bhatta to vaccinators	2,100	0	0	1,602	0	0					
	Arrears of pay, &c.	397	3	0	397	3	0					
	Contingencies	239	5	0	239	5	0					
	Kattywar States total...	13,448	8	0	12,438	8	3	77,757	96·2	0	2	8
	Circle total...	15,224	8	0	14,196	8	3	89,902	96·1	0	2	9
Sind Circle.	2 Vaccrs., Khairpur, Rs. 25 each do.	600	0	0	600	0	0	5,547	97·1	0	2	4
	2 Peons do. Rs, 7 each do.	168	0	0	168	0	0					
	Circle total...	768	0	0	768	0	0	5,547	97·1	0	2	4

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
	Rs. a. p.	Rs. a. p.			Rs. a. p
D.—Paid by Native Chiefs or Landlords—*continued.*					
Paid by H. H. the Gaikawad.					
Baroda Circle. 1 Native Inspr. at Rs. 27 per mens.	324 0 0	324 0 0			
Travlng. allowance to do., Rs. 27 do.	324 0 0	324 0 0			
Bhatta to do., Rs. 15 do.	180 0 0	117 4 11			
1 Vaccr., Rs. 25 do.	300 0 0	300 0 0			
6 do. ,, 18 each do.	1,296 0 0	1,293 8 6			
11 do. ,, 15 ,, do.	1,980 0 0	1,979 0 0			
Contingencies	120 0 0	120 0 0			
1 Clerk Rs. 30 do.	375 0 0	375 0 0			
2 Peons Rs. 9 each do.	216 0 0	216 0 0			
18 ,, ,, 7 ,, do.	1,512 0 0	1,496 8 9			
Contingencies	21 9 9	21 9 9			
For Kattywar Districts.					
1 Vaccr., Rs. 30 per mens. ...	360 0 0	360 0 0			
1 do. ,, 22 do. ...	264 0 0	264 0 0			
3 do. ,, 20 each do. ...	720 0 0	720 0 0			
4 Peons ,, 8 ,, do. ...	384 0 0	384 0 0			
Contingencies	24 0 0	24 0 0			
Temporary Establishment.					
2 Vaccrs. at Rs. 9 each per mens. ...	18 0 0	13 14 10			
2 Peons ,, 7 ,, do. ...	14 0 0	10 6 2			
Total Baroda Rs. ...	8,432 9 9	8,343 4 11			
Equivalent to British Rs. ...	7,404 5 1	7,326 6 1			
Circle total...	7,404 5 1	7,326 6 1	38,639	93·5	0 3 4
Paid by H. H. the Rao.					
Cutch Circle. 1 Asst. Supdt. Rs. 10-14-2 per mens.	130 10 0	130 10 0			
Bhatta to do. at Rs. 7-14-8 do.	95 0 0	84 6 11			
Pony expense to do. at Rs. 9-14-3 do.	118 11 0	110 13 1			
1 Peon at Rs. 3-2-8 do.	38 0 0	33 4 0			
Bhatta to do. at Rs. 3-15-4 do.	47 8 0	41 15 3			
1 Vaccr. at Bhuj, Rs. 12-1-6 do.	145 2 0	145 2 0			
1 Vaccr. at Mándvi Rs. 7-14-8 do.	95 0 0	95 0 0			
6 ,, at Rs. 7-4-2 do.	479 3 0	458 9 3			
Bhatta to do at Rs. 7-14-8 do.	522 8 0	494 3 2			
Pony expense to do. at Rs. 9-14-3 do.	652 12 6	638 4 2			
6 Peons, Rs. 3-2-8 each do.	209 0 0	139 5 0			
Bhatta to do. at Rs. 3-15-4 each do.	261 4 0	229 12 9			
Total...	2,794 10 6	2,601 5 7	4,673	92·7	0 9 9

1	2	3	4	5	6
	Sanctioned.	Expended.	Total number vaccinated and re-vaccinated.	Percentage of success, excluding those unknown from the total.	Cost of each successful case.
	Rs. a. p.	Rs. a. p.			Rs. a. p.
D.—Paid by Native Chiefs or Landlords—*concluded.*					
Paid by Bhayáds.					
Cutch Circle—*concld.* 1 Vaccr. at Rs. 9-14-3 per mens. ...	118 11 0	89 0 3			
1 do. ,, 7-14-8 do. ...	95 0 0	95 0 0			
Bhatta to do. Rs. 3-15-4 & Rs. 7-14-8 do.	142 8 0	130 10 0			
Pony expense to do. Rs. 3-15-4 do.	95 0 0	83 2 0			
1 Peon at Rs. 2-10-2 do.	31 10 0	31 10 0			
Bhatta to do. at Rs. 3-15-4 do.	47 8 0	47 8 0			
1 Vaccr. at Rs. 10 do.	120 0 0	120 0 0			
1 Peon ,, ,, 4 do.	48 0 0	48 0 0			
1 Vaccr.,, ,, 7-14-8 do.	95 0 0	7 14 8			
Bhatta to do. at Rs. 3-15-4 do.	47 8 0	3 15 4			
Total...	840 13 0	656 12 3	569	92·7	1 3 11
Circle total...	3,635 7 6	3,258 1 10	5,242	92·7	0 10 11
Total paid by Native Chiefs...	42,576 13 4	40,422 14 9	227,453	96·1	0 3 0
Grand Total...	2,54,450 12 6	2,22,802 1 8	776,302	95·5	0 4 11

A.—VACCINE DEPARTMENT.

STATEMENT No. IV., showing Results of the Year 1875-76 *as compared with those of each of the previous five years in the Bombay Presidency.*

1	2	3	4	5				6	7	8	9
				Number of Vaccinators.							
Year.	Total number of persons vaccinated and re-vaccinated.	Number successful.	Ratio per cent. successful, excluding those "unknown" from the total.	A. Paid by state.	B. Paid from other sources.	C. Total.	D. Number previously employed as inoculators or private practitioners.	Cost of whole vaccine establishment.	Cost of travelling allowances and contingencies.	Total cost.	Cost of each successful case.
								Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
1870-71 ...	491,605	447,048	95·0	134	192	226	None.	142,536 0 0	27,515 0 0	170,051 0 0	0 6 0
1871-72 ...	526,402	484,095	94·8	3	370	373		156,331 0 0	28,128 5 2	184,459 5 2	0 6 1
1872-73 ...	561,196	504,263	93·9	2	371	373		177,848 4 0	32,946 12 11	210,795 0 11	0 6 8
1873-74 ...	622,880	558,304	94·1	2	376	378		185,607 12 3	30,468 12 1	216,076 8 4	0 6 2
1874-75 ...	704,152	656,902	95·5	2	383	385		191,419 4 9	29,244 1 0	220,663 5 9	0 5 4
1875-76 ...	776,302	726,785	95·5	2	387	389		191,952 2 6	30,849 15 2	222,802 1 8	0 4 11

B.—DISPENSARY

STATEMENT No. V., showing Particulars of Vaccination in the Dispensaries in

1	2	3		4		5		6	7	8				
Circle of medical Superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	A. Sex			
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.				Males.	Females.	Christian	Hindu.
Central Circle.	J. Pinkerton, M.D., Surgeon-Major, officiating.	..	..	..	..	..	8	Ahmednagar. Ahmednagar	....	Jail.	..	..	..	..
		..	..	..	..	..	74	Do.	....	Dispensary.	..	..	..	..
		..	..	..	..	262	90	Sangamner	9,978	Do.	144	116	..	203
		..	..	..	..	262	172		9,978		144	116	..	203
		..	..	..	..	281	209	Poona. Junnar	10,298	Dispensary.	144	137	3	235
		..	..	..	..	103	98	Indápur	7,740	Do.	48	55	1	77
		..	..	..	..	..	6	Khed	....	Do.	..	..	..	..
		..	..	..	..	190	178	Sirur	5,049	Do.	86	104	3	128
		..	..	..	..	228	159	Sáswad	6,416	Do.	115	113	1	224
		..	..	..	..	149	135	Jejuri	3,102	Do.	69	80	..	105
		..	..	..	..	126	125	Bárámati	4,975	Do.	65	61	..	119
		..	..	..	..	27	17	Talegaon	5,040	Do.	14	13	..	25
		..	..	..	..	1,104	927		42,620		541	563	8	913
		..	..	..	..	288	244	Satara. Karád	11,410	Dispensary	159	129	.	232
		..	..	..	..	278	142	Islámpur	8,390	Do.	140	132	..	252
		..	..	..	..	189	245	Wai	11,062	Do.	100	89	1	185
		..	..	..	..	141	113	Mhaswad	6,321	Do.	78	63	..	129
		..	..	..	..	130	167	Pátan	3,033	Do.	66	62	..	108
		..	..	..	..	102	33	Pusesauli	2,456	Do.	51	51	..	99
		..	..	..	..	89	32	Mahableshwar	2,759	Do.	30	28	6	42
		..	..	..	..	1,217	976		45,431		624	554	7	1,047
		..	..	..	..	..	20	Sholápur. Sholapur	..	Jail	..	..	..	..
		..	..	..	..	248	574	Do.	53,403	Dispensary.	119	128	..	191
		..	..	..	..	..	26	Bársi	..	Do.	..	..	..	..
		..	..	..	..	169	40	Karmála	6,759	Do.	103	66	..	148
		..	..	..	..	..	112	Pandharpur	..	Do.	..	..	..	..
		..	..	..	..	417	772		60,162		222	194	..	339
		..	..	..	..	88	926	Ratnágiri. Vingorla	14,996	Dispensary.	47	41	16	70
		..	..	..	..	165	169	Dápoli	2,595	Do.	90	65	1	143
		..	...	..	..	253	1,095		17,591		137	106	17	213
		..	..	..	..	342	330	Akalkot	8,470	Dispensary.	170	172	..	242
Total..		..	..	..	..	3,595	4,272		184,252		1,838	1,705	32	2,957

VACCINATION.

each Circle of Superintendence in the Bombay Presidency during the Year 1875-76.

9										10					11		12
Primary vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful	Unsuccessful, including those doubtful	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	re-vaccinations.	Average number of persons vaccinated by each vaccinator.
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
54	..	3	40	220	228	14	18	260	..	2	..	..	2	..	94·2	100	262
54	..	3	40	220	228	14	18	260	..	2	..	..	2	..	94·2	100	262
43	..	..	72	209	264	12	5	281	..	..	..	..	..	..	95·6	..	281
10	..	15	64	39	93	7	4	104	1	..	..	..	..	..	93·0	..	103
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
36	..	23	77	113	176	19	6	201	11	..	..	..	..	..	90·2	..	190
3	..	..	89	139	209	6	16	231	3	..	..	..	..	..	97·2	..	228
8	..	36	32	117	135	8	8	151	2	..	..	..	..	..	94·4	..	149
7	..	..	59	67	140	8	..	148	22	..	..	..	..	..	94·5	..	126
2	..	..	7	20	19	7	1	27	..	..	..	..	..	..	73·0	..	27
109	..	74	400	704	1,036	67	40	1,143	39	..	..	..	..	..	93·9	..	157
56	..	..	128	160	273	17	6	296	8	..	..	..	..	..	94·1	..	288
20	..	..	146	126	259	9	4	272	..	6	..	..	6	..	96·6	100	278
3	..	..	72	117	183	5	1	189	..	..	..	..	..	..	97·3	..	189
12	..	..	47	94	135	9	1	145	4	..	..	..	..	..	93·7	..	141
20	..	..	61	67	122	8	1	131	3	..	..	2	2	..	93·8	..	130
3	..	..	43	59	98	4	..	102	..	..	..	..	..	..	96·0	..	102
5	3	2	21	37	48	12	..	60	2	22	9	..	31	..	80·0	70·9	89
119	3	2	518	660	1,118	64	13	1,195	17	28	9	2	39	..	94·5	75·6	173
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
54	..	2	122	125	239	20	2	261	14	..	1	..	1	..	92·2	..	248
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
20	..	1	61	108	166	5	2	173	4	..	..	..	..	..	97·0	..	169
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
74	..	3	183	233	405	25	4	434	18	..	1	..	1	..	94·1	..	208
2	..	..	35	53	71	17	..	88	..	..	..	..	..	..	80·6	..	88
9	2	..	96	59	158	12	..	170	15	3	11	..	14	4	92·9	21·4	165
11	2	..	131	112	229	29	..	258	15	3	11	..	14	4	88·7	21·4	126
100	..	..	257	85	340	4	2	346	4	..	..	..	..	..	98·8	..	342
467	5	82	1 259	2,014	3,356	203	77	3,636	93	33	21	2	56	4	94·2	61·1	179

1	2	3		4		5		6	7	8	A.			
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Sex.		Christian.	Hindu.
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.				Males.	Females.		
Southern Circle.	J. Raby, Surgeon.	..	..	..	..	21	..	Belgaum — Belgaum	..	Jail.	19	2	..	12
		..	..	..	..	77	..	Belgaum — Parasgad	..	Dispensary.	39	38	..	73
		..	..	..	..	122	..	Belgaum — Gokak	12,612	Do.	65	57	..	112
		..	..	..	..	23	47	Belgaum — Athni	11,588	Do.	13	19	..	23
		..	..	..	..	243	47		24,200		136	107	..	220
		..	..	..	..	32	17	Dharwar — Dharwar	..	Jail.	8	1	1	6
		..	..	..	..	50	54	Dharwar — Hubli	37,961	Dispensary.	27	23	1	39
		..	..	..	..	82	71		37,961		35	24	2	45
		..	..	..	..	..	8	Kaladgi — Bágalkot	..	Dispensary.	..	..	..	..
		..	..	..	..	6	..	Kaladgi — Kaladgi	6,592	Civil Hosp.	3	3	..	2
		..	..	..	..	6	8		6,592		3	3	..	2
		..	..	..	..	355	769	Kanara — Karwar	13,263	Civil Hosp.	127	86	27	146
		..	..	..	..	491	378	Kanara — Coompta	10,932	Dispensary.	199	164	42	309
		..	..	..	..	143	81	Kanara — Honawar	5,191	Do.	74	69	25	114
		..	..	..	..	423	99	Kanara — Sirsi	5,285	Do.	195	217	6	312
		..	..	..	..	68	57	Kanara — Siddápur	1,564	Do.	29	39	..	53
		..	..	..	..	315	103	Kanara — Halyal	5,071	Do.	147	167	15	216
		..	..	..	..	3	29	Kanara — Supa	639	Do.	2	1	..	3
		..	..	..	..	50	65	Kanara — Yellápur	1,531	Do.	33	17	2	27
		..	..	..	..	60	74	Kanara — Mundgod	1,183	Do.	30	27	..	41
		..	..	..	..	1,818	1,655		44,659		836	787	117	1,221
		..	..	..	..	1,304	849	Koláhpur	39,621	Civil Hosp.	475	442	5	793
		..	..	..	..	338	479	Sáwant Wári	8,017	Dispensary.	125	143	38	184
Total ..		..	..	..	..	3,791	3,109		161,050		1,610	1,506	162	2,465
Western Circle.	T. Cody, Surgeon.	..	..	..	..	315	276	Khándes — Párola	12,235	Dispensary.	161	153	..	294
		..	..	..	..	129	166	Khándes — Erandol	11,071	Do.	76	53	..	115
		..	..	..	..	69	207	Khándes — Dharangaon	12,087	Bhil Corps.	28	25	..	47
		..	..	..	..	118	..	Khándes — Chopra	13,699	Dispensary.	62	55	..	78
		..	..	..	..	631	649		48,092		327	286	..	534
		..	..	..	..	181	163	Násik — Sinnár	10,044	Dispensary.	114	67	..	151
		..	..	..	..	185	191	Násik — Dindori	3,130	Do.	87	98	..	174
		..	..	..	..	350	309	Násik — Yeola	17,461	Do.	164	186	..	323
		..	..	..	..	181	..	Násik — Málegaon	9,701	Do.	94	87	..	158
		..	..	..	..	897	663		40,336		459	438	..	806

9										10					11		12
Primary vaccine operations.										Re-vaccinations.							
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.	Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
Caste.			Age.		Result.												
Musalman	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
9	..	..	1	20	16	3	2	21	..	..	..	..	..	..	84·2	..	21
4	..	..	12	65	71	7	1	79	2	..	..	..	..	..	91·0	..	77
10	..	..	48	74	118	4	..	122	..	..	..	..	..	..	96·6	..	122
..	..	..	15	8	10	10	3	23	..	..	..	..	..	..	50·0	..	23
23	..	..	76	167	215	24	6	245	2	..	..	..	..	..	89·9	..	60
2	..	..	..	9	5	3	1	9	..	18	5	..	23	..	62·5	78·2	32
10	..	..	27	23	50	..	..	50	..	..	..	..	..	..	100	..	50
12	..	..	27	32	55	3	1	59	..	18	5	..	23	..	94·8	78·2	41
4	..	..	1	5	2	4	..	6	..	..	..	..	..	..	33·3	..	6
4	..	..	1	5	2	4	..	6	..	..	..	..	..	..	33·3	..	6
40	..	..	85	128	173	49	1	223	10	98	49	6	153	11	77·9	66·6	355
12	..	..	145	218	346	20	6	372	9	27	11	..	38	..	94·5	71·0	401
4	..	..	19	124	131	12	..	143	..	..	..	..	..	..	91·6	..	143
94	..	..	57	355	377	36	4	417	5	4	7	..	11	..	91·2	35·4	423
15	..	..	1	67	61	9	..	70	2	..	..	..	..	..	50·1	..	68
83	..	..	96	218	295	18	1	314	..	..	1	..	1	..	94·1	..	315
..	..	..	1	2	13	2	..	3	..	..	..	..	..	..	33·3	..	3
21	..	..	6	44	41	7	2	50	..	..	..	..	..	..	85·4	..	50
16	..	..	18	39	47	9	1	57	..	..	3	..	3	..	83·9	..	60
285	..	..	428	1,195	1,472	162	15	1,649	26	129	71	6	206	11	90·0	64·5	202
116	..	3	373	544	752	47	118	917	..	189	188	10	387	..	94·1	50·1	1,304
46	..	..	174	94	263	17	1	281	13	45	28	..	73	3	93·9	61·6	338
486	..	3	1,079	2,037	2,752	257	141	3,157	41	381	292	16	689	14	91·4	56·6	210
20	..	..	108	206	304	10	..	314	..	..	1	..	1	..	96·8	..	315
14	..	..	64	65	129	..	..	129	..	..	..	..	..	..	100	..	129
6	..	..	38	15	34	19	..	53	..	11	5	..	16	..	64·1	68·7	69
22	..	17	32	85	112	..	5	117	..	1	..	..	1	..	100	100	118
62	..	17	242	371	579	29	5	613	..	12	6	..	18	..	95·5	66·6	157
24	..	6	53	128	150	21	10	181	..	..	..	..	..	..	87·7	..	181
11	..	..	118	67	169	..	16	185	..	..	..	..	..	..	100	..	185
27	..	..	152	198	248	52	50	350	..	..	..	..	..	..	82·7	..	351
23	..	..	74	107	177	8	4	189	8	..	..	..	..	..	95·7	..	180
85	..	6	397	500	744	81	80	905	8	..	..	..	..	..	90·2	..	224

1	2	3		4		5		6	7	8	A. Sex.			
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	Males.	Females.	Christian.	Hindu.
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.							
Western Circle—*concluded.*	T. Cody, Surgeon.	..	..	..	..	92	119	Colába. Alibág	5,473	Dispensary.	50	42	..	83
		..	..	..	..	57	68	Colába. Pen ..	6,514	Do. ..	23	32	..	55
		..	..	..	..	205	..	Colába. Mahád ..	6,631	Do. ..	104	96	1	187
		..	..	..	..	354	187		18,618		177	170	1	325
		..	..	..	..	326	270	Tanna. Kelvi Máhim ..	6,660	Dispensary.	149	165	2	307
		..	..	..	..	222	211	Tanna. Kalyán ..	12,804	Do. ..	119	103	..	186
		..	..	..	..	238	476	Tanna. Bhiwandi ..	15,607	Do. ..	108	120	1	87
		..	..	..	..	18	100	Tanna. Bassein ..	9,356	Do. ..	11	7	7	10
		..	..	..	..	22	35	Tanna. Tanna ..	14,299	Civil Hospl	13	9	..	21
		..	..	..	..	242	94	Tanna. Bandora ..	7,227	Do. ..	130	92	139	68
		..	..	..	..	158	100	Tanna. Cooria ..	3,000	Do. ..	79	79	13	126
		..	..	..	..	66	54	Tanna. Uran ..	8,690	Do. ..	30	35	21	38
		..	..	..	..	71	..	Tanna. Mátherán ..	1,000	Do. ..	42	25	8	48
		..	..	..	..	1,363	1,340		78,643		681	635	191	891
		..	..	..	..	208	51	Peint ..	2,004	Dispensary.	111	97	..	206
Total ..		..	..	..	..	3,453	2,890	....	187,693	....	1,755	1,626	192	2,762
Eastern Guzerat Circle.	Manekerji Beramji Colah, M. D.	..	..	..	..	..	315	Surat. Surat	..	Jail ..	..	..	..	..
		..	..	..	..	339	332	Surat. Rander	10,280	Dispensary.	173	166	..	293
		..	..	..	..	77	132	Surat. Bardoli	4,229	Do.	40	37	..	73
		..	..	..	..	129	81	Surat. Mándvi	4,296	Do.	78	51	..	115
		..	..	..	..	76	..	Surat. Olpad	4 001	Do.	36	29	..	63
		..	..	..	..	73	87	Surat. Chikhli	3,178	Do.	37	36	..	62
		..	..	..	..	392	252	Surat. Balsar	11,313	Do.	173	210	..	256
		..	..	..	..	176	165	Surat. Párdi	4,699	Do.	83	93	..	146
		..	..	..	..	109	51	Surat. Kali Wádi ..	1,532	Do.	70	39	..	20
		..	..	..	..	1,371	1,415		43,528		690	671	..	1,028
		..	..	..	..	217	192	Broach. Ankleswar ..	9,414	Dispensary.	109	108	..	145
		..	..	..	..	76	108	Broach. Hánsot	4,152	Do.	47	29	..	63
		..	..	..	..	55	81	Broach. Eláo	1.915	Do.	26	30	..	40
		..	..	..	..	276	244	Broach. Jambusar	14,924	Do.	152	121	..	254
		..	..	..	..	624	625		30,405		334	288	..	502
		..	..	..	..	248	168	Kaira. Dákor	7,740	Dispensary.	153	95	..	240
		..	..	..	..	636	530	Kaira. Kapadwanj ..	13,982	Do,	327	289	..	390
		..	..	..	..	335	290	Kaira. Borsad	12,214	Do.	168	167	2	262
		..	..	..	..	364	302	Kaira. Mehmadabad ..	8,065	Do.	184	148	..	257
		..	..	..	..	342	307	Kaira. Mahuda	9,384	Do.	185	157	..	213
		..	..	..	..	1,925	1,597		51,385		1,017	856	2	1,362
		..	..	..	..	431	500	Panch Máhals. Godhrá	10,635	Dispensary	216	213	..	174

9										10					11		12
Primary vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
B.			C.		D.			E.	F.	A.	B.	C.	D	E.			
Caste.			Age.		Result.												
Musalman	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful	Unsuccessful, including those doubtful	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
4	1	4	40	52	74	18	..	92	..	..	..	..	..	..	80·4	..	92
..	..	..	28	27	24	17	17	58	3	..	2	..	2	..	58·5	..	57
12	..	..	81	119	195	6	1	202	2	1	4	..	5	..	97·0	20·0	205
16	1	4	149	198	293	41	18	352	5	1	6	..	7	..	87·7	14·3	118
5	..	.	127	187	287	43	..	330	16	7	5	..	12	..	86·9	58·3	326
32	2	2	122	100	181	21	22	224	2	..	..	..	..	..	89·6	..	222
81	2	57	135	103	214	12	2	228	..	4	6	..	10	..	94·7	40·0	238
1	..	..	10	8	17	..	1	18	..	..	..	..	..	..	100	..	18
1	..	..	10	12	22	..	..	22	..	..	..	..	..	..	100	..	22
11	4	..	38	194	206	12	4	222	..	10	10	..	20	..	94·5	50·0	242
15	3	1	66	92	140	11	9	160	2	..	..	..	..	..	92·7	..	158
6	..	..	34	31	63	4	..	67	2	..	1	..	1	..	94·0	..	66
10	..	1	32	35	47	20	..	67	..	3	1	..	4	..	70·1	75·0	71
162	11	61	554	762	1,177	123	38	1,338	22	24	23	..	47	..	90·5	51·1	151
2	..	..	35	173	200	9	..	209	1	..	..	..	..	..	95·7	..	208
327	12	88	1,377	2,004	2,993	283	141	3,417	36	37	35	..	72	..	91·4	51·4	164
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
45	1	..	250	89	322	10	9	341	2	..	..	..	..	..	96·9	..	339
4	..	..	67	10	70	8	2	80	3	..	..	..	..	..	89·7	..	77
13	1	..	73	51	120	4	7	131	2	..	..	..	..	..	96·7	..	129
8	4	..	42	33	71	4	..	75	..	1	..	..	1	..	94·6	100	76
11	..	..	61	12	71	..	2	73	..	..	..	..	..	..	100	..	73
107	20	..	187	196	366	10	7	383	.	4	5	..	9	..	97·3	44·4	392
29	1	..	109	67	175	1	..	176	..	..	..	..	..	..	99·0	..	176
14	75	..	38	71	104	1	4	109	..	..	..	..	..	..	99·0	..	109
231	102	..	832	529	1,299	38	31	1,368	7	5	5	..	10	..	97·1	50·0	171
47	25	..	122	95	210	5	2	217	..	..	..	..	..	..	97·6	..	217
13	..	..	40	36	70	1	5	76	..	..	..	..	..	..	98·5	..	76
2	14	..	43	13	44	15	4	63	7	1	1	..	2	..	74·5	50·0	58
19	..	..	224	49	269	1	3	273	..	..	..	..	..	..	99·6	..	273
81	39	..	429	193	593	22	14	629	7	1	1	..	2	..	96·4	50·0	156
8	..	..	113	135	236	10	5	251	3	..	..	..	..	..	95·9	..	248
226	..	..	399	217	608	6	2	616	..	14	3	3	20	..	99·0	82·3	636
30	..	41	257	78	314	14	7	335	..	..	..	..	..	..	95·7	..	335
75	..	..	263	69	325	5	7	337	5	25	7	..	32	..	98·4	78·1	364
129	..	..	281	61	322	13	7	342	..	..	..	..	..	..	96·1	..	342
468	..	41	1,313	560	1,805	48	28	1,881	8	39	10	3	52	..	97·4	79·5	385
233	..	22	372	57	402	11	16	429	..	2	..	..	2	..	97·3	100	431

1	2	3		4		5		6	7	8				
Circle of medical superintendence.	Name and rank of superintendent or dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	A. Sex.			
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.				Males.	Females.	Christian.	Hindu.
Eastern Gujerat Circle—*concluded.*	Mancherji Beramji Collali, M. D.	..	..	..	..	87	92	Rewa Kánta } Bária	2,891	Dispensary	52	35	..	44
		..	..	..	..	197	264	Máhi Kánta. } Sádra	6,749	Do.	101	78	..	170
Total...		..	..	..	..	4,635	4,493		145,593		2,410	2,141	2	3,280
Western Gujerat Circle	A. M. Blomfield, Surgeon-Major, Officiating.	..	..	..	..	198	191	Ahmedabad. Dholka	20,854	Dispensary	104	94	..	147
		..	..	..	..	347	200	Dholera	12,468	Do.	187	156	..	297
		..	..	..	..	76	122	Viramgám ..	19.661	Do.	40	36	..	52
		..	..	..	..	252	147	Sánand	7,229	Do.	127	125	..	241
		..	..	..	..	278	246	Parántej	8,341	Do.	131	147	..	244
		..	..	..	..	239	205	Gogo	9.571	Civil Hospital.	130	102	8	89
		..	..	..	..	1,390	1,111		78,124		719	660	8	1,070
		..	..	..	..	..	64	Kattywar. Rájkot	..	Jail.	..	..	..	..
		..	..	..	..	150	44	Wadhwán ..	1,059	Dispensary	55	58	..	105
		..	..	..	..	56	5	Manakwára ..	1,000	Do.	27	28	..	47
		..	..	..	..	31	21	Songarh	890	Do.	18	13	..	28
		..	..	..	..	237	134		2,949		100	99	..	180
		..	..	..	..	43	..	Kattywar States. Bántwá	10,970	Dispensary	21	22	..	11
		..	..	..	..	681	553	Gondal	13,180	Do.	353	319	1	493
		..	..	..	..	..	57	Sursai	1,453	Do.	..	..	..	..
		..	..	..	..	391	605	Dhoráji	15,562	Do.	191	200	..	238
		..	..	..	..	185	171	Upleta	6,500	Do.	93	92	1	115
		..	..	..	..	249	401	Bhayáwadar ..	5,563	Do.	122	127	..	210
		..	..	..	..	1,549	1,787		53,228		780	760	2	1,067
Total..		..	..	..	..	3,176	3,032		134,301		1,599	1,519	10	2,317
Sind Circle.	J. Williams, M.D., Surgeon.	..	..	..	..	..	6	Kurrachee. Kurrachee	....	Dispensary	..	..	..	..
		..	..	..	..	157	88	Manora	809	Do.	21	11	7	9
		..	..	..	..	48	39	Bula Khan'sThána	440	Do.	14	12	..	12
		..	..	..	..	87	117	Sehwan	4,294	Do.	50	37	1	26
		..	..	..	..	227	232	Tatta	7,951	Do.	147	80	1	101
		..	..	..	..	43	90	Jerruck	1,666	Do.	16	17	..	23
		..	..	..	..	44	66	Keti Bandar ..	2.199	Do.	28	16	..	38
		..	..	..	..	290	356	Mirpur Batoro ..	2,846	Do.	148	102	2	116
		..	..	..	..	896	994		20,205		424	275	11	325

9										10					11		12
Primary vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		Average number of persons vaccinated by each vaccinator.
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	
6	..	37	32	55	80	4	3	87	..	..	..	..	..	..	95·2	..	87
9	..	..	151	28	172	7	2	181	2	7	10	3	20	2	96·0	41·1	197
1,028	141	100	3,129	1,422	4,351	130	94	4,575	24	54	26	6	86	2	97·0	67·5	231
51	..	..	187	11	186	8	4	198	..	..	..	..	..	..	95·8	..	198
46	..	..	182	161	363	14	15	392	49	6	..	..	6	2	96·2	100	347
24	..	..	68	8	73	3	..	76	..	..	..	..	..	..	96·0	..	76
11	..	..	200	52	244	5	4	253	1	..	..	..	..	..	97·9	..	252
34	..	..	228	50	261	17	..	278	..	..	..	..	..	..	93·3	66·6	278
135	..	..	122	110	205	27	..	232	..	4	2	1	7	..	96·2	..	239
301	..	..	987	392	1,332	74	23	1,429	50	10	2	1	13	2	94·7	83·3	231
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
6	1	1	62	51	81	24	17	122	9	11	21	5	37	..	77·1	34·3	150
7	..	1	22	33	47	3	5	55	..	1	..	..	1	..	94·0	100	56
3	..	..	18	13	27	4	..	31	..	..	..	..	..	..	87 1	..	31
16	1	2	102	97	155	31	22	208	9	12	21	5	38	..	83·3	36·3	79
32	..	..	31	12	41	..	3	44	1	..	..	..	..	..	100	..	43
166	4	8	361	311	637	6	29	672	..	3	5	1	9	..	99·0	37·5	681
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
153	..	..	122	269	321	70	16	407	16	..	..	..	..	..	82·0	..	391
69	..	..	88	97	135	44	10	189	4	..	..	..	..	..	75·4	..	185
39	..	..	220	29	244	4	3	251	2	..	..	..	..	..	98 3	..	249
459	4	8	822	718	1,378	124	61	1,563	23	3	5	1	9	..	91·7	37·5	309
776	5	10	1,911	1,207	2,865	229	106	3,200	82	25	28	7	60	2	92·5	47·1	226
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
16	..	..	16	16	12	20	..	32	..	..	56	72	128	3	37·5	..	157
8	..	6	10	16	17	4	5	26	..	10	12	..	22	..	80·9	45·4	48
60	..	..	42	45	69	8	16	93	6	..	..	..	..	..	89·6	..	87
125	..	..	84	143	186	26	16	228	1	..	..	..	..	..	87·7	..	227
10	..	..	24	9	20	10	3	33	..	4	6	..	10	..	66·6	40·0	43
6	..	..	29	15	29	14	4	47	3	..	..	..	..	..	67·4	..	44
124	..	8	125	125	207	22	27	256	6	28	2	10	40	..	90·3	93·3	290
349	..	14	330	369	540	104	71	715	16	42	76	82	200	3	83 8	35·5	128

1	2	3		4		5		6	7	8					
Circle of medical superintendence.	Name and rank of superintendent of dispensary.	Number of native superintendents of vaccination attached to the dispensary.		Number of vaccinators attached to the dispensary.		Total number of persons vaccinated.		Collectorate, political agency, or native state for the population of which the dispensary is provided.	Population of area included in the last column.	Name of dispensary.	A. Sex.		Christian.	Hindu.
		1875-76.	1874-75.	1875-76.	1874-75.	1875-76.	1874-75.				Males.	Females.		
Sind Circle—*concluded.*	J. Williams, M.D., Surgeon.	..	..	..	..	1,494	208	Hyderabad. Muhammad Khan's Tando	3,412	Dispensary	45	40	..	44
		..	..	..	..	642	235	Hyderabad. Allahyar Tando	3,913	Do.	114	78	1	116
		..	..	..	..	179	..	Hyderabad. Mirpur Khas	1,280	Do.	39	29	..	22
		..	..	..	..	363	101	Hyderabad. Hala	4,096	Do.	92	32	..	45
		..	..	..	..	366	106	Hyderabad. Thárú Sháh	2,219	Do.	125	77	..	115
		..	..	..	..	3,044	650		14,920		415	256	1	342
		..	..	..	..	218	416	Thar and Párkar. Umarkot	3,999	Dispensary	117	71	..	154
		..	..	..	..	245	279	Thar and Párkar. Mitti	2,580	Do.	56	46	..	63
		..	..	..	..	166	157	Thar and Párkar. Khipra	2,425	Do.	80	56	..	130
		..	..	..	..	26	209	Thar and Párkar. Nagar Parkar	1,460	Do.	16	10	..	16
		..	..	..	..	655	1,061		10,464		269	183	..	363
		..	..	..	..	287	260	Shikarpur. Lárkána	10,643	Dispensary	152	135	..	124
		..	..	..	..	169	175	Shikarpur. Mehar	1,246	Do.	58	36	..	31
		..	..	..	..	456	435		11,889		210	171	..	155
		..	..	..	..	43	112	Makrán Coast. Goadar	6,000	Dispensary.	23	19	..	..
Total ..		..	..	..	..	5,094	3,252		63,478	....	1,341	904	12	1,185
		..	..	..	..	..	144	Muscat	..	Dispensary.	..	..	..	..
Grand Total.		..	..	..	..	23,744	21,192		876,367	....	10,553	9,401	410	14,966

Details of Column 5.

Total number of persons vaccinated.....	23,744
Deduct persons re-vaccinated.....	3,790
Number of persons primarily vaccinated ..	19,954

Details of Primary Vaccinations.

Total number of operations (Col. 9 E.)	..
Deduct excess of operations over persons (Col. 9 F.) ..	..
Number of persons vaccinated	..

9										10					11		12
Primary vaccine operations.										Re-vaccinations.					Percentage of successful cases, excluding those unknown from the total.		
B.			C.		D.			E.	F.	A.	B.	C.	D.	E.			
Caste.			Age.		Result.												
Musalman.	Parsi.	Other castes.	Under 1 year	Above 1 year.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful, including those doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.	Average number of persons vaccinated by each vaccinator.
37	..	4	53	32	80	4	1	85	..	1,245	92	72	1,409	..	95·2	93·2	1,494
51	..	24	109	83	168	1	23	192	..	302	33	115	450	..	99·4	90·1	642
33	..	13	21	47	57	4	7	68	..	90	6	15	111	..	93·4	93·7	179
79	..	..	52	72	94	17	16	124	..	92	80	67	239	..	84·2	53·4	363
85	..	2	128	74	195	4	3	202	..	144	11	9	164	..	97·9	92·9	366
285	..	43	363	308	591	30	50	671	..	1,873	222	278	2,373	..	91·9	89·4	608
34	..	..	85	103	152	26	10	188	..	25	5	..	30	..	85·3	83·3	218
9	..	30	73	29	93	6	3	102	..	82	35	26	143	..	93·9	70·0	245
6	..	..	81	55	136	..	..	136	..	30	..	..	30	..	100	100	166
7	..	3	22	4	26	..	..	26	..	..	..	..	..	..	100	..	26
56	..	33	261	191	407	32	13	452	..	137	40	26	203	..	95·2	77·4	163
163	..	..	151	136	175	9	103	287	..	..	..	..	..	..	95·1	..	287
63	..	..	53	41	89	5	..	94	..	66	7	2	75	..	94·6	90·4	169
226	..	..	204	177	264	14	103	381	..	66	7	2	75	..	94·9	90·4	228
42	..	..	4	38	30	8	4	42	..	..	1	..	1	..	78·9	..	43
958	..	90	1,162	1,083	1,832	188	241	2,261	16	2,118	346	388	2,852	3	99·6	86·7	268
..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
4,042	163	373	10,187	9,767	18,156	1,290	800	20,246	292	2,648	748	419	3,815	25	93·3	77·9	212

.. ..	20,246
.. ..	292
.. ..	19,954

Details of Re-vaccinations.

Total number of operations (Col. 10 D.)	3,815
Deduct excess of operations over persons (Col. 10 E.)....	25
Number of persons re-vaccinated	3,790

C.—VACCINATION DEPARTMENT.

STATEMENT No. VI., showing Particulars of Vaccination in the Bombay Army for 1875-76.

European Army.	Number successfully vaccinated.								Total.
	Europeans.				Natives.				
	Males.	Females.	Children.	Total.	Males.	Females.	Children.	Total.	
Regiments	179	7	338	524	...	...	2	2	526
Lines	...	...	...	...	4	...	182	186	186
Bazaars	...	...	...	...	...	...	113	113	113
Total...	179	7	338	524	4	...	297	301	825

Strength of Europeans	Men	10,197	
	Women	1,190	
	Children	2,301	
			13,688

Native Army.	Number of vaccinators.		Total number of persons vaccinated and re-vaccinated.		Strength.			Primary Vaccinations.													Re-vaccinations.					Percentages of successful cases, excluding those unknown from the total.	
								Sex.		Caste.					Age.		Result.											
	1		2		3			4		5					6		7			8	9	10			11	12	13	
	1875-76.	1874-75.	1875-76.	1874-75.	Europeans.	Natives.	Total.	Males.	Females.	Christian.	Hindu.	Musalman.	Parsi.	Other castes.	Under 1 year.	Above 1 year.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	Excess of operations over persons.	Successful.	Unsuccessful and doubtful.	Unknown.	Total.	Excess of operations over persons.	In primary vaccinations.	In re-vaccinations.
Regiments	..	..	3,759	3,603	1,038	46,090	47,128	1,248	1,093	78	1,776	411	..	76	1,788	553	2,243	228	4	2,475	134	941	533	6	1,480	62	90·7	63·8
* Camp-followers ..	4	4	3,723	2,949	2,007	95,611	97,618	1,776	1,713	184	2,254	918	32	101	3,074	415	3,263	298	55	3,616	127	163	85	..	248	14	91·6	65·7
Total ..	4	4	7,482	6,552	3,045	141,701	144,746	3,024	2,806	262	4,030	1,329	32	177	4,862	968	5,506	526	59	6,091	261	1,104	618	6	1,728	76	91·2	64·1

* Regimental Lines or Bazaar and Cantonment Bazaar.

Details of Column 2.

Total number of persons vaccinated	7,482
Deduct persons re-vaccinated	1,652
Number of persons primarily vaccinated.....	5,830

Details of Primary Vaccinations.

Total number of operations (Column 8,).....	6,091
Deduct excess of operations over persons (Column 9)	261
Number of persons primarily vaccinated	5,830

Details of Re-vaccinations.

Total number of operations (Column 11).....	1,728
Deduct excess of operations over persons (Column 12)	76
Number of persons re-vaccinated	1,652

RETURN of Small-pox in European Army for 1875-76.

		Remained.	Admitted.	Total.	Recovered.	Died.	Remaining.	Total.	Previously vaccinated.
Regiments.....	Males	1	6	7	2	1	4	7	7
	Females ...	...	2	2	1	...	1	2	2
	Children ...	...	1	1	1	...	...	1	1
	Total...	1	9	10	4	1	5	10	10

RETURN of Small-pox in Native Army for 1875-76.

		Remained.	Admitted.	Total.	Recovered.	Died.	Transferred.	Remaining.	Total.	Previously vaccinated.
Regiments ...	Males ...	6	32	38	21	1	5	11	38	38
	Females ...	...	37	37	15	3	11	8	37	37*
	Children ...	1	45	46	16	4	9	17	46	45
Regimental Lines or Bazaars. ...	Males ...	...	8	8	2	1	3	2	8	8
	Females ...	...	3	3	2	...	...	1	3	3
	Children ...	...	8	8	6	...	1	1	8	8
	Total...	7	133	140	62	9	29	40	140	139

* One female was previously inoculated.

D.

SUMMARY OF THE DIARIES OF INSPECTING OFFICERS

AND

DEATHS FROM SMALL-POX.

D.—VACCINATION DEPARTMENT.

STATEMENT No. VII.—SUMMARY of the Diaries of Superintendents of Vaccination and their Assistants for the year 1875-76.

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1875-76.	Deaths from small-pox in 1875.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
Presidency.	1		Bombay.	City of Bombay	..	..	..	..	..	..	..	..	..	..	..	...	..	..	..	35,658	246
Central.	Surgeon-Major.	Ramji Khanderao.	Ahmednagar:	Nagar	2	10	12	3	94	97	41	438	479	10	24	34	646	1,309	1,955	3,250	3
				Párner	2	18	20	2	18	20	21	192	213	3	27	30	155	754	909	1,670	1
				Shrigonda	2	18	20	2	22	24	32	129	161	10	28	38	510	825	1,335	1,883	2
				Karjat	3	15	18	3	17	20	33	154	187	5	29	34	568	744	1,312	1,875	1
				Jámkhed	3	13	16	3	16	19	40	165	205	8	24	32	480	788	1,268	2,228	..
				Sheogaon	5	16	21	7	25	32	82	198	280	19	37	56	1,225	1,325	2,550	3,412	17
				Newása	2	16	18	2	21	23	18	131	149	14	37	51	368	1,043	1,411	1,971	4
				Ráhuri	4	19	23	5	29	34	53	258	311	25	76	101	858	2,408	3,266	2,645	2
				Kopargaon	3	13	16	3	17	20	21	162	183	11	42	53	448	742	1,190	3,099	..
				Sangamner	9	20	29	10	24	34	83	223	306	34	54	88	1,092	1,519	2,611	2,825	3
				Akola	4	17	21	4	18	22	42	188	230	22	58	80	734	1,628	2,362	2,255	7
		1			39	175	214	44	301	345	466	2,238	2,704	161	436	597	7,084	13,085	20,169	27,113	40
		Trimbak Anant.	Poona.	Junnar	6	6	12	8	15	23	72	151	223	11	6	17	775	229	1,004	1,836	5
				Indápur	..	17	17	..	31	31	..	435	435	..	93	93	..	2,226	2,226	1,916	4
				Khed	6	18	24	7	35	42	67	294	361	25	35	60	1,318	1,164	2,482	2,728	14
				Sirur	..	6	6	..	11	11	..	151	151	..	24	24	..	668	668	1,838	1
				Purandhar	..	19	19	..	38	38	..	426	426	..	68	68	..	1,716	1,716	2,588	3
				Bhimthari	..	13	13	..	30	30	..	426	426	..	53	53	..	1,501	1,501	2,688	6
				Haveli	1	15	16	4	94	98	255	427	682	..	56	56	..	2,782	2,782	6,202	135
				Máwal	10	20	30	15	31	46	130	366	496	22	60	82	654	792	1,446	1,463	18
		1			23	114	137	34	285	319	524	2,676	3,200	58	395	453	2,747	11,078	13,825	21,259	186

| | | |

Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Name of Taluka	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1875-76.	Deaths from small-pox in 1875.
					Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
		Balwantrao Ganesh.	Belgaum.	Belgaum	4	5	9	6	21	27	71	164	235	1	17	18	22	873	895	2,941	241
				Sampgaon	3	19	22	8	27	35	65	325	390	10	73	83	625	2,761	3,386	4,326	119
				Bidi	3	..	3	3	..	3	33	..	33	7	..	7	415	..	415	1,838	16
				Chikori	4	32	36	4	52	56	53	389	442	6	88	94	267	2,774	3,041	5,744	171
				Parasgad	2	23	25	5	23	28	48	137	185	5	23	28	486	656	1,142	2,518	19
				Gokák	..	21	21	..	33	33	..	278	278	..	53	53	..	1,233	1,233	1,702	40
				Athni	..	18	18	..	28	28	..	153	153	..	28	28	..	1,632	1,632	4,656	97
				Kolhápur State Torgal	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	910	..
				Southern Mahratta States Sháhápur ..	..	3	3	..	15	15	...	114	114	..	15	15	..	779	779	1,724	..
				Rámdurg ..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	767	..
		1			16	121	137	26	199	225	270	1,560	1,830	29	297	326	1,815	10,708	12,523	27,126	693
		Swamirao Rango.	Dharwar.	Dharwar	5	16	21	8	24	32	125	169	294	8	76	84	192	2,392	2,584	3,990	14
				Hubli	3	19	22	3	31	34	39	174	213	4	76	80	106	2,174	2,280	3,315	2
				Nawalgund	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	3,230	55
				Gadag	2	..	2	2	..	2	39	..	39	3	..	3	294	..	294	2,485	17
				Bankápur	3	22	25	6	20	26	64	233	297	8	64	72	295	1,917	2,212	1,446	19
				Hangal	4	10	14	5	11	16	49	110	159	10	58	68	283	1,598	1,881	1,454	15
				Karajgi	1	8	9	1	10	11	6	77	83	2	23	25	59	882	941	2,572	18
				Ranibenur	..	19	19	..	14	14	..	271	271	..	46	46	..	495	495	871	28
				Kod	..	18	18	..	25	25	...	307	307	..	66	66	..	1,078	1,078	780	25
				Kalghatgi	..	13	13	..	11	11	..	103	103	2	35	37	36	777	813	1,191	1
				Ron	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,140	44
				Southern Maratha States Shirhatti	1	..	1	1	..	1	20	..	20	2	..	2	16	..	16	428	..
				Lakshmeshwar ..	1	..	1	1	..	1	12	..	12	1	..	1	299	..	299	677	..
				Miraj (Junior) ..	..	..	..	..	..	..	..	..	..	1	..	..	62	..	62	369	..
				Kundgol	1	3	4	1	4	5	12	17	29	1	4	5	139	295	434	808	...
				Sawanur	1	6	7	1	7	8	9	96	105	1	20	21	293	419	712	796	..
		1			22	134	156	29	157	186	375	1,557	1,932	43	468	511	2,074	12,027	14,101	25,552	238
		Bálappa	dgi,	Bagalkot	..	21	21	..	50	50	..	303	303	..	90	90	..	2,263	2,263	2,766	33
				Bijápur	..	17	17	..	23	23	..	180	180	..	50	50	..	2,044	2,044	3,199	7
				Indi	..	13	13	..	14	14	..	128	128	..	36	36	..	1,435	1,435	2,052	87
				Sindgi	..	16	16	..	24	24	..	136	136	..	39	39	..	1,656	1,656	2,785	47
				Bagewári	..	30	30	..	45	45	..	318	318	..	65	65	..	2,224	2,224	3,161	48
				Hungund	..	7	7	..	13	13	..	93	93	..	39	39	..	1,040	1,040	2,489	49

| Son | J. Baby, | T. Cody, Surgeon. | Western. | Kalá | Datu | | |

Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Taluka.	Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1875-76.	Deaths from small-pox in 1875.
					Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
—*concluded.*		Dharma Bapu.	Khándesh.—*concluded.*	Amalner	..	7	7	...	23	23	..	177	177	..	43	43	..	687	687	1,857	1
				Erandol	..	20	20	..	32	32	..	330	330	..	75	75	..	1,489	1,489	2,522	3
				Páchora	2	6	8	5	13	18	97	159	256	16	22	38	236	196	432	999	..
				Chopra	5	14	19	6	22	28	68	273	341	21	53	74	782	815	1,597	1,891	..
				Sauda	3	18	21	7	34	41	70	337	407	16	63	79	881	1,932	2,813	2,246	..
				Bhusáwal	2	16	18	4	32	36	59	288	347	16	51	67	338	670	1,008	1,526	1
				Nasirabád	..	16	16	..	35	35	..	408	408	..	51	51	..	1,350	1,350	1,737	1
				Jámner	1	9	10	4	39	43	35	353	388	14	55	69	323	726	1,099	1,633	2
					13	106	119	22	230	256	329	2,325	2,654	83	413	496	2,560	7,915	10,475	14,411	7
		2			24	214	238	48	414	462	573	4,621	5,194	142	772	914	4,564	15,133	19,697	28,847	22
	Su rgeon.	Kisansing Daulatsing.	Native State. Násik.	Násik	3	11	14	4	54	58	250	301	551	..	77	77	..	748	748	2,439	5
				Sinnar	3	4	7	4	4	8	59	59	118	16	..	16	456	..	456	2,164	1
				Igatpuri	4	9	13	7	14	21	100	167	267	14	31	45	319	317	636	1,502	..
				Dindori	..	10	10	..	14	14	..	192	192	..	23	23	..	319	319	1,917	..
				Niphad	..	9	9	..	10	10	..	144	144	..	40	40	..	452	452	1,581	7
				Chándor	1	19	20	3	23	26	161	398	559	7	35	42	74	558	632	1,794	4
				Yeola	1	25	26	4	30	34	44	341	385	10	60	70	206	750	956	1,591	4
				Nandgaon	1	16	17	4	21	25	45	161	206	11	25	36	204	460	664	1,016	1
				Baglan	4	14	18	6	16	22	55	145	200	11	49	60	272	977	1,249	1,658	3
				Málegaon	..	13	13	..	14	14	..	192	192	..	33	33	..	581	581	2,227	4
				Kalwan	2	4	6	3	10	13	32	143	175	13	16	29	295	206	501	1,567	5
				Peint	..	5	5	..	7	7	..	57	57	..	26	26	..	561	561	1,430	5
		1			19	139	158	35	217	252	746	2,300	3,046	82	415	497	1,826	5,929	7,755	20,895	39
		Vinayak.	ba.	Alibág	2	51	53	5	85	90	65	621	686	10	137	147	93	1,013	1,106	1,299	34
				Pen	..	17	17	..	30	30	..	211	211	..	51	51	..	372	372	1,535	14
				Nagothna Petha	1	11	12	1	17	18	18	111	129	..	38	38	..	344	344	282	3
				Roha	..	9	9	..	17	17	..	124	124	2	21	23	31	222	253	437	12

Western	T. Cody.	Máhádeo	Colá	Mángaon	..	..	..	2	3	5	4	5	9	38	72	110	14	..	14	148	..	148	1,741	6
				Málád	..	..	..	3	2	5	6	2	8	198	29	227	8	..	8	185	..	185	3,847	5
			Native State.	Janjira	..	..	..	..	31	31	..	54	54	..	331	331	..	82	82	..	2,881	2,881	2,592	..
		1						8	124	132	16	210	226	319	1,499	1,818	34	329	363	457	4,832	5,289	11,733	73
		Balaji Ráyáji.	Tanna.	Dáhánu	..	..	..	1	4	5	2	5	7	195	76	271	3	3	6	112	73	185	1,803	..
				Máhim	..	..	..	2	35	37	5	49	54	71	415	486	9	53	62	191	927	1,118	1,905	1
				Wára	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,104	..
				Sháháp ur	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	4,488	40
				Murbád	..	..	..	..	20	20	..	36	36	..	263	263	..	49	49	..	516	516	1,355	22
				Kalyan	..	..	..		4	4	..	8	8	..	80	80	..	10	10	..	112	112	1,990	8
				Bhiwandi	..	..	..	1	14	15	1	24	25	12	204	216	..	30	30	..	495	495	1,911	57
				Bassein	..	..	..	2	13	15	5	20	25	61	193	254	16	16	32	252	242	494	1,256	9
				Salsette	..	..	..	9	39	48	11	162	173	406	718	1,124	3	110	113	150	1,306	1,456	2,506	36
				Panwel*	..	..	..	2	10	12	8	33	41	78	232	310	13	47	60	354	644	998	2,300	56
				Karjat	..	..	..	3	14	17	4	32	36	54	235	289	6	32	38	107	390	497	1,972	57
			Native State.	Jawhár	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,377	..
		1						20	153	173	36	369	405	877	2,416	3,293	50	350	400	1,166	4,705	5,871	23,967	286
		5						71	630	701	135	1,210	1,345	2,515	10,836	13,251	308	1,866	2,174	8,013	30,599	38,612	85,442	420
Eastern Guzerat.	Muncherji Beramji Colah, M.D.	Jethálál Punjaji.	Surat.	Surat City	..	..	..	..	..	..	..	..	..	..	..	..	1	1	2	200	444	644	2,120	89
				Chorási	..	..	..	2	7	9	7	25	32	91	329	420	9	27	36	281	441	722	1,322	44
				Bardoli	..	..	..	3	5	8	10	7	17	116	51	167	23	16	39	907	324	1,231	2,181	8
				Mandvf	..	..	..	3	5	8	4	10	14	48	105	153	8	21	29	196	447	643	1,578	8
				Olpad	..	..	..	4	20	24	13	36	49	140	290	430	39	62	101	631	809	1,440	1,500	58
				Chikhli	..	..	..	1	16	17	3	31	34	35	256	291	6	35	41	207	1,028	1,235	2,009	5
				Bulsar	..	..	..	3	5	8	12	23	35	149	254	403	27	20	47	677	337	1,014	1,826	24
				Pardi	..	..	..	2	1	3	10	2	12	113	37	150	24	3	27	647	29	676	1,564	..
				Jalalpur	..	..	..	1	13	14	7	23	30	66	242	308	18	31	49	372	486	858	1,647	14
			Native States.	Dharampur	..	..	..	..	11	11	..	12	12	..	85	85	..	21	21	..	2,150	2,150	3,622	..
				Bansda	..	..	..	..	3	3	..	11	11	..	91	91	..	26	26	..	941	941	1,733	..
				Sachin	..	..	..	..	..	..	..	..	..	..	..	..	..	2	2	..	22	22	338	..
								19	86	105	66	180	246	758	1,740	2,498	155	265	420	4,118	7,458	11,576	21,440	250
		Parbhurám Pranshankar.	Broach.	Broach	..	..	..	4	15	19	8	28	36	101	340	441	16	50	66	297	1,223	1,520	2,716	5
				Ankleswar	..	..	..	2	8	10	4	16	20	80	151	231	5	32	37	144	564	708	1,035	5
				Hansot	..	..	..	2	5	7	5	9	14	57	117	174	16	28	44	247	404	651	828	2
				Wagra	..	..	..	1	1	2	3	3	6	28	31	59	7	3	10	141	49	190	778	..
				Amod	..	..	..	2	6	8	3	11	14	32	111	143	7	4	11	212	127	339	886	..
				Jambusar	..	..	..	2	11	13	5	34	39	82	334	416	13	64	77	214	1,652	1,866	2,218	5
			Rewa Kánta States.	Rajpipla	..	..	..	..	15	15	..	39	39	..	439	439	..	74	74	..	1,828	1,828	3,596	..
				Chota Udepur	..	..	..	4	21	25	8	44	52	74	472	546	22	68	90	310	936	1,246	1,204	..
				Sankhera Mewas	..	..	..	2	13	15	4	27	31	37	222	259	11	21	32	133	288	421	430	..
								19	95	114	40	211	251	491	2,217	2,708	97	344	441	1,698	7,071	8,769	13,691	17

* The assistant superintendent's inspections in Panwel were done by Mr. Máhádeo Vinayak, of Colába Zillah.

Circle.	Superintendent.	Name of			Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated during the year 1875.	Deaths from small-pox in 1875.
		Assistant superintendent.	Collectorate.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
Eastern Guzerat—*concluded.*	Mancherji Beramji Colah, M.D.	Parbhudas Hirji	Kaira.	Mátar	1	4	5	5	20	25	46	130	176	13	26	39	555	681	1,236	2,617	81
				Thásra	1	1	2	4	11	15	36	84	120	9	27	36	274	638	912	2,372	23
				Kapadwanj	1	10	11	2	37	39	15	397	412	4	59	63	288	1 754	2,042	2,825	12
				Borsad	4	14	18	8	33	41	85	410	495	12	45	57	570	2 445	3,015	4,053	165
				Mehmadabad	1	10	11	4	26	30	46	215	261	12	31	43	527	1,133	1,660	2.829	13
				Nariád	3	9	12	7	19	26	58	230	288	18	29	47	782	991	1,773	3,627	140
				Anand	3	17	20	10	64	74	126	654	780	21	54	75	1,214	1,829	3,043	4,197	166
			Native State.	Cambay	..	4	4	3	10	13	43	110	153	5	15	20	153	812	965	2,156	..
		1			14	69	83	43	220	263	455	2,230	2,685	94	286	380	4,363	10,283	14,646	24,676	600
		Jéhálál Ganpatram.	Panch Máhals.	Godhra	1	22	23	4	41	45	36	373	409	8	60	68	212	1,277	1,489	2 849	3
				Dohad	3	10	13	3	26	29	18	233	251	8	67	75	367	2,390	2,757	3.083	4
				Kálol	..	10	10	..	18	18	..	241	241	..	37	37	..	1,092	1,092	1,232	4
				Hálol	..	13	13	..	36	36	..	380	380	..	82	82	..	1,176	1.176	1,263	2
				Jhálod	2	5	7	4	11	15	44	105	149	11	58	69	685	1,486	2,171	2,125	..
			Rewa Kánta.	Bária	5	26	31	12	43	55	126	312	438	86	127	213	1,157	1 935	3.092	3.657	..
				Lumáwárá	2	18	20	5	38	43	57	244	301	22	120	142	303	1,356	1,659	1,298	..
				Sunth	3	13	16	8	15	23	64	230	294	23	43	66	286	432	718	1 261	..
				Karána	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Bálásinor	..	4	4	1	19	20	15	192	207	1	69	70	19	956	975	768	..
				Jambughora	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	353	..
		1			16	121	137	37	247	284	360	2,310	2,670	159	663	822	3,029	12,100	15,129	17,889	13
		None.	Máhi Kánta.	Nani Márwad	..	7	7	..	16	16	..	205	205	..	16	16	..	1,058	1,058	5,918	..
				Watrak Kánta	..	4	4	..	10	10	..	116	116	..	27	27	..	693	693	1,114	..
				Sábar Kánta	..	..	..	..	1	1	..	36	36	..	1	1	..	28	28	1,375	..
				Rhever	..	1	1	..	6	6	..	85	85	..	19	19	..	349	349	529	..
				Katosan	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,299	..
				Bávisi	..	1	1	..	1	1	..	19	19	..	1	1	..	35	35	182	..
		..			..	13	13	..	34	34	..	461	461	..	64	64	..	2,163	2,163	10,417	..
		..	..	Baroda	2	..	2	1	..	1	18	..	18	..	..	..	..	..	..	..	..
Total.	1	4	..		70	384	454	187	892	1,079	2,082	8,958	11,040	505	1,622	2,127	13,208	39.075	52,283	88,113	880

| Bardárnia Nánamlá. | | |

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected.			Total number of children vaccinated and re-vaccinated during the year 1875-76.	Deaths from small-pox in 1875.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Taluka.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
Western Guzerat—*concluded.*	A. M. Blomfield, Surgeon-Major.	None.	Pálanpur States.	Pálanpur	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	7,512	..
				Rádhanpur	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,814	..
				Tharád	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,732	..
				Morwára	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	1,302	..
				Kánkrej	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	2,221	..
	..	..			..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	14,581	..
	..	..		Kodinar	..	2	2	..	2	2	..	13	13	..	..	..	..	..	..	..	..
Total.	1	3	..		49	381	430	122	871	993	1,237	6,674	7,911	238	1,062	1,300	15,968	30,026	45,994	121,379	177
	M.D., Surgeon.	Lachman.	Kurrachee.	Kurrachee	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	157	..
				Do. Town	3	6	9	3	85	88	322	721	1,043	1	5	6	11	1,041	1,052	3,089	..
				Kohistan	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
				Dádu	1	20	21	2	20	22	31	158	189	13	56	69	222	533	755	4,174	..
				Sehwan	3	17	20	4	24	28	67	227	294	3	42	45	66	361	427	2,019	..
				Mánjhanda	4	8	12	5	8	13	62	129	191	8	14	22	91	312	403	1,293	..
				Kotri	12	22	34	19	23	42	813	228	1,041	4	38	42	42	624	666	1,401	..
				Tatta	4	21	25	5	15	20	129	254	383	19	26	45	208	73	281	2,431	..
				Sákro	3	32	35	4	32	36	136	288	424	12	46	58	92	261	353	839	..
				Ghorabári	3	..	3	3	..	3	53	..	53	14	..	14	86	..	86	1,081	3
				Belo	1	13	14	1	17	18	32	211	243	..	41	41	..	232	232	1,690	..
				Mirpur Batoro	3	5	8	3	5	8	47	56	103	22	7	29	178	22	200	1,318	1
				Játi	1	28	29	2	28	30	393	423	12	90	102	96	439	535	1,301	..	
				Shahbandar	3	16	19	3	17	20	61	130	191	8	64	72	73	254	327	725	1
	1	..			41	188	229	54	274	328	1,783	2,795	4,578	116	429	545	1,165	4,152	5,317	21,518	5
	Asst. Surgeon.	Mal.	Bad.	Hyderabad	3	8	11	4	12	16	63	121	184	12	19	31	252	303	555	3,265	..
				Do. City	1	7	8	1	32	33	15	171	186	1	8	9	3	532	535	2,309	1
				Dero Mohbat	..	3	3	..	5	5	..	52	52	..	7	7	..	98	98	702	..
				Guni	4	12	16	4	22	26	78	240	318	2	21	23	77	278	355	2,825	..

| Hyderabad | | |

Name of					Number of encampments.			Number of travelling days.			Number of miles travelled.			Number of villages visited.			Number of vaccinated children inspected			Total number of children vaccinated and re-vaccinated during the year 1875-76.	Deaths from Small-pox in 1875.
Circle.	Superintendent.	Assistant superintendent.	Collectorate.	Taluka.	Superintendent	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.	Superintendent.	Assistant superintendent.	Total.		
SIND—*concluded.*	J. Williams, M.D., Surgeon.	..	Native State.	Khairpur	2	34	36	2	49	51	38	504	542	..	112	112	..	3,323	3,323	5,547	..
	..	..	Mekran Coast.	Goadar	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	43	..
Total.	1	5	..		93	820	913	120	1,185	1,305	2,907	13,938	16,845	378	1,843	2,221	6,406	27,916	34,322	155,043	48
Baroda.	H. Atkins Surgeon-Major.	Sudárám Ichárám.	Baroda.	H. H. the Gaikawad's territory ..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	38,639	..
Cutch.	Dordji Hormasji, C. C. M. C.	Jádhawaji Surji.	Cutch.	H. H. the Rao's territory ..	..	68	68	..	106	106	..	704	704	..	130	130	..	2,896	2,896	5,242	..
Aden.	..	..	Aden	Aden	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	2,182	54
Grand Total.	9	30	..		404	4,278	4,682	730	7,268	7,998	11,354	65,071	76,425	1,771	11,267	13,038	59,379	274,265	333,644	800,046	3,599

Bombay, 20th May 1876.

J. PINKERTON, M.D., Surgeon-Major,
Superintendent General of Vaccination, Bombay Presidency.

No. 2160.

GENERAL DEPARTMENT.

Bombay Castle, 17th July 1876.

Letter from the Surgeon-General, Indian Medical Department, No. 2631, dated 4th July 1876—Submitting the Annual Report on Vaccination for the year 1875-76 with his observations and remarks.

RESOLUTION.—Government are glad to notice that without in any way lessening the usefulness of the Annual Report, Dr. Pinkerton has contrived to curtail its dimensions both in the matter of letter-press and statistical tables. The general work of the department has been satisfactorily done, and is creditable to the officers concerned.

2. The year has been distinguished by a severe epidemic of small-pox in Bombay, which, however, did not spread to any great extent to the neighbouring districts, with perhaps the exception of Tanna. One consequence has been to draw the attention of Government to the need of compulsory vaccination in the city of Bombay, and a Bill for this purpose, drafted by Dr. Pinkerton, is now under the consideration of Government, who are confident that it will meet with the support and approval of intelligent public opinion. From the general results of the operations of the department it would not appear to be necessary for the Mofussil, as Government believe that there the opposition to and prejudice against vaccination are surely being overcome. That this is a correct view is shown by the great increase in successful operations in the Southern Circle, which from being one of the most backward is now taking a high place, to the credit of its Superintendent, Dr. Raby.

3. The attention of the Secretary of State should be called to the omission of the annual supplies of lymph, as pointed out in the 25th paragraph of the report, with the expression of the hope of Government that Dr. Pinkerton's request may be complied with. Very much of the vaccination in Bombay this year was performed directly from the heifer, and with very fair success.

4. The total cost of the department exceeded that of last year by Rs. 2,138, being Rs. 2,22,802, as compared with Rs. 2,20,663, which is due chiefly to the increase in establishment of 1 vaccinator and 3 peons in Native States, and the cost of heifers purchased in Bombay during the prevalence of the epidemic. It will be time to consider the question of debiting a portion of the expenses of the Vaccination Department to that of sanitation, when the Government of India have sanctioned the proposals of this Government about the amalgamation of the two departments. Out of the total expenditure, Imperial claims Rs. 1,05,570, Municipal Rs. 16,123, Local Funds Rs. 60,686, Native Chiefs Rs. 40,423.

5. The average cost of each successful vaccination was, exclusive of the pay of Superintendents, 3 annas 8 pies, being a decrease of 3 pies from last year. Including all charges it was 4 annas 11 pies, or 5 pies less than in 1874-75. The circles which have most reduced the cost are the Presi-

dency, from 8 annas 9 pies to 4 annas 4 pies, and Cutch from 14 annas 8 pies to 10 annas 11 pies. In the last-named there is still much room for improvement. The average number of persons vaccinated by each operator varies from 436 in Cutch to 3,060 in Sind. These show a large increase on the previous year, while the Presidency Circle rises to 2,228 from 1,176.

6. The work done by the various Superintendents seems to have been thoroughly satisfactory, Drs. Williams, Cody, Raby, and Blomfield, and Mr. Ananta Chandroba, being specially brought to the notice of Government. Dr. Pinkerton's opinion that personal examination of some 3,000 children by each Superintendent in his own division as to the success of the operations is a sufficient test of the work done, is concurred in.

7. It is much to be regretted that no less than 12 vaccinators had to be dismissed; and, judging from the heavy fines inflicted by Dr. Blomfield on others, more ought to have shared this fate. The expediency of fining repeatedly or heavily such men as vaccinators is open to question.

8. The report of the Collector of Ratnágiri on the subject of inoculation in that district, as pointed out in paragraph 42, may be awaited, and the attention of the Collectors of Surat and Kaira called to Dr. Pinkerton's remarks in his 48th paragraph on the extreme inaccuracy of the death registers in their respective districts. Such cases as these show the advantage of utilising the services of the officers of the Vaccination Department in sanitary inspections.

9. In addition to their proper duties as Superintendents of Vaccination the officers of the department have inspected dispensaries, examined birth and death registers, and advised on the removal or abatement of nuisances.

10. In conclusion, Government fully recognise the excellent services of Dr. Pinkerton as head of the department over which he has so long and successfully presided.

11. The usual copies of this report and Government Resolution should be sent to the Secretary of State.

E. W. RAVENSCROFT,
Acting Chief Secretary to Government.

To

The SURGEON-GENERAL, INDIAN MEDICAL DEPARTMENT,

The SANITARY COMMISSIONER,

The MUNICIPAL COMMISSIONER for the CITY of BOMBAY,

All COLLECTORS, including the COLLECTORS and POLITICAL SUPERINTENDENTS in SIND, and the EXTRA FIRST ASSISTANT COLLECTOR in charge PANCH MA'HA'LS,

The REVENUE COMMISSIONER, N. D.,

The REVENUE COMMISSIONER, S. D.,

The COMMISSIONER in SIND,

The POLITICAL DEPARTMENT of the SECRETARIAT,

The COMPILER of the GENERAL ADMINISTRATION REPORT of the PRESIDENCY for 1875-76.

00133476

Digitized with financial assistance from

Government of Maharashtra

on 01 February, 2020